

AN ABSTRACT OF THE THESIS OF

Shan-Hsin, Angie, Ho for the degree of Master of Science in
Apparel, Interiors, Housing and Merchandising presented
on February 5, 1991

Title: A Comparative Study of Apparel Shopping Orientations
between Asian Americans and Caucasian Americans

Abstract approved: Redacted for Privacy
 Cheryl Jordan

Very little empirical research has been conducted on Asian Americans as a whole in relation to their consumer behavior, specifically their clothing behavior. A review of literature demonstrated that Asian Americans have been studied from different psychographic and sociological aspects. However, the apparel shopping behavior of this market has received only slight research attention. The purpose of this study was to compare Asian Americans and Caucasian Americans with regards to apparel shopping orientations. This study also examined the relationship between apparel shopping orientations and intensity of ethnic identification among Asian Americans.

The multimediation model of consumer behavior (EKB model) proposed by Engel, Kollat and Blackwell (1973) was used as a theoretical framework for the present study. Based on the EKB model, it was expected that people of different cultural backgrounds were different in terms of

their consumer behavior. Another conceptual framework used in the present study was the concept of shopping orientations, introduced by Stone (1954). Apparel shopping orientations refer to motivations, interests and attitudes toward apparel shopping.

Seven shopping orientations were selected for the present study. They were: economic shopping, personalizing shopping, recreational shopping, social shopping (including friend social shopping and family social shopping), brand loyal shopping, impulse shopping and fashion orientations. The fashion orientation included four factors: fashion leadership, fashion interest, fashion importance and anti-fashion attitude.

The nature of the study was observational, in which no variables were manipulated. The data collection method involved a mailed questionnaire. The questionnaire included questions measuring seven shopping orientations, Asian Americans' intensity of ethnic identification and questions on demographic characteristics. A purposive sample of 300 Asian American and 300 Caucasian American students were drawn from the students enrolled at Oregon State University for 1990 Fall term.

A pretest was conducted before the data were collected. Dillman's "Total Design Method" (1978) was used as a guideline when implementing the data collection procedures. The response rates were 75.9% for the total sample, with 72.6% for the Asian group and 79.0% for the Caucasian group.

The collected data were analyzed by multivariate analysis of variance (MANOVA), t-test and Pearson correlation.

Significant differences were found between Asian and Caucasian American respondents on social shopping, including both friend social and family social shopping, brand loyal shopping, and fashion leadership orientations.

The Asian respondents were found to be significantly more brand loyal and liked to shop with friends or family members than were the Caucasian respondents. The Asian American students were also found to be more likely to regard themselves as fashion leaders than were the Caucasian students in this study.

Also a negative correlation was found between intensity of ethnic identification and fashion importance among Asian American respondents. This finding indicated that the more an Asian respondent identified with Asian ethnicity, the less (s)he considered being well-dressed to be important.

A Comparative Study of Apparel Shopping Orientations
between Asian Americans and Caucasian Americans

by

Shan-Hsin, Angie, Ho

A THESIS

submitted to

Oregon State University

in partial fulfillment of
the requirements for the
degree of

Master of Science

Completed February 5, 1991

Commencement May 1991

APPROVED:

Redacted for Privacy

Assistant Professor of Apparel, Interiors, Housing and
Merchandising in charge of major

Redacted for Privacy

Head of department of Apparel, Interiors, Housing and
Merchandising

Redacted for Privacy

Dean of Graduate School

Date thesis is presented February 5, 1991

Typed by Shan-Hsin, Angie, Ho

ACKNOWLEDGEMENT

I would like to thank my major professor, Dr. Cheryl Jordan, for her precious guidance, suggestions and encouragement during the process of completing this study. Also appreciation is extended for the help and input from my committee members, Dr. Leslie Davis, Dr. Boris Becker and Dr. Clinton Brown. Special appreciation is extended to Pam Bodenroeder and Suzy Maresh of the Survey Research Center at Oregon State University. Without the assistance from all these people, this study would not have been conducted and completed as planned.

Most of all, I offer my deepest gratitude to my husband, Kenneth Guo. Although he was thousands of miles away in another country while I was conducting and writing this thesis, his love, spiritual and financial support always backed me up along the way.

To my dearest four-year-old son, Li-Wei, my appreciation for him is beyond words. Many days and nights, he spent the time with baby sitters and friends so that I could work on my thesis. Also, to my new-born baby, which was born one week before the completion of this study, I thank him for going through all this with me very cooperatively.

To God and all my friends, I am so grateful for all of your help.

TABLE OF CONTENTS

<u>Chapter</u>	<u>Page</u>
I INTRODUCTION	1
Purpose of the Study	2
Asian American Demographic Profile	3
Ethnic Groups and Population Projection	4
Scholastic Achievement	5
Occupational Status	6
Economic Achievement	7
Market Research on Asian Americans	8
Significance of the Study	10
Definition of Terms	14
II REVIEW OF LITERATURE	16
Culture, Ethnicity and Clothing Behavior	16
Intensity of Ethnic Identification	26
Asian Americans	30
Shopping Orientations	33
Shopping Orientations for the Present Study	47
Economic Shopping	48
Personalizing Shopping	49
Recreational Shopping	49
Social Shopping	50
Brand Loyal Shopping	50
Impulse Shopping	51
Fashion Orientation	51
III METHOD	53
Hypotheses	53
Research Design	54
Sample	55
Research Instrument	56
Data Collection	62
Data Analyses	63
Summary	64
IV FINDINGS AND DISCUSSION	66
Questionnaire Response Rate	66
Demographic Characteristics of the Respondents	67
Reliability and Validity of the Scales	75
Descriptive Analysis of Variables	82
Results of Hypotheses Testing	85
MANOVA Test Results for Shopping	85
Orientations by Ethnicity	
T-test Results of Each Sub-hypothesis	86
under Hypothesis 1	
Correlation Test of Hypothesis 2	90
Additional Analyses	94
Summary	99

V	SUMMARY AND RECOMMENDATIONS	103
	Findings and Marketing Implications	104
	Conclusions	111
	Limitations	115
	Recommendations for Future Research	116
	REFERENCE	118
	APPENDICES	
	Appendix A - Correspondence for the Survey	126
	Appendix B - Questionnaire	130
	Appendix c - Application for Exemption Review	140
	Protection of Human Subjects	

LIST OF TABLES

<u>Table</u>	<u>Page</u>
1 Oregon State University Asian American vs White American Student Population	57
2 Questionnaire Response Rate	68
3 Demographic Characteristics of the Respondents (Categorical Data)	69
4 Demographic Characteristics of the Respondents (categorical Data)	71
5 Demographic Characteristics of the Respondents (Continuous Data)	73
6 Demographic Characteristics of the Respondents (Categorical Data)	74
7 Estimates of Reliability of the Scales	76
8 Factor Loadings of Shopping Orientations	79
9 Factor Loadings of Fashion Orientation	81
10 Descriptive Statistics of Variables	83
11 MANOVA Test Results for Shopping Orientations by Ethnicity	87
12 Results of T-test for Each Orientation by Ethnicity	89
13 Mann-Whitney Test of Each Orientation by Ethnicity	91
14 Correlation Analysis of Shopping Orientations by Intensity of Ethnic Identification	93
15 One-way ANOVA of Shopping Orientations by Sex	97
16 One-way ANOVA of Fashion Orientation by Sex	98
17 Two-way ANOVA of Shopping Orientations by Ethnicity & Sex	100
18 Two-way ANOVA of Fashion Orientation by Ethnicity & Sex	101

A COMPARATIVE STUDY OF APPAREL SHOPPING ORIENTATIONS BETWEEN ASIAN AMERICANS AND CAUCASIAN AMERICANS

CHAPTER I

INTRODUCTION

Since the revision of the U.S. immigration law in 1965, Asian Americans have been the fastest growing ethnic group in the U.S (Bouvier & Agresta, 1985). Asian Americans, constituting 2.7 percent of the total U.S. population, ranked third by size among minorities in 1985 as compared to blacks (12% of U.S. population) and Hispanics (7%) (U.S. Department of Commerce, 1987).

In addition to having the fastest population growth, Asian Americans in recent decades have made remarkable socioeconomic gains, which have resulted in changing societal perceptions of Asian Americans (Hirschman & Wong, 1984). Therefore, Asian Americans have become a viable ethnic target market, after blacks and Hispanics, for marketers and retailers.

Do Asian Americans differ from the majority Caucasian Americans in apparel shopping behavior? This question is crucial to market planning for a given product category, such as apparel, for it will influence whether to consider Asian Americans as a distinct apparel market segment. If

they are a distinct segment, how are they different from the majority of Caucasian Americans? In addition, if ethnicity as a variable influences apparel shopping behavior, what is the relationship between the intensity of ethnic identification (how strong Asian Americans identify themselves with Asian ethnicity) and their apparel shopping behavior?

Purpose of the Study

The purpose of this study was to compare Asian Americans and Caucasian Americans with regard to apparel shopping orientations. Apparel shopping orientations refer to motivations, interests and attitudes toward apparel shopping as well as shopping activities. This study also examined the relationship between apparel shopping orientations and intensity of ethnic identification among Asian Americans.

The following research questions were answered when this study was completed:

1. What is the pattern of apparel shopping orientations of Asian American in comparison with Caucasian American students at Oregon State University (OSU)?
2. Is there any correlation between apparel shopping orientations and intensity of ethnic identification among OSU Asian American students?

Asian American Demographic Profile

In Asia, societies such as those in Hong Kong, Taiwan, Japan, Singapore and South Korea all have one thing in common. They are influenced to some extent by values and norms of Confucian philosophy (Tan & McCullough, 1984). Confucius, the founder of Confucianism, was born in the year of 551 B.C. in China. Confucianism is a system of teachings of Confucius and his disciples characterized by central emphasis on the practice and cultivation of the virtues of filial piety, kindness, righteousness, propriety, intelligence and faithfulness. Confucianism has historically formed the basis of much of Chinese ethics, education and religion. As Chinese political power advanced to neighboring countries, such as Korea and Japan, Confucianism spread and won new converts in many Oriental countries (Starr, 1930).

Today, Confucianism still remains a vital part of these Oriental cultures. The relationships of family members, husband, wife and relatives still show strong evidence of Confucian influence. Many values regarding a man's role in society and a woman's role at home, beliefs in the rights and wrongs, attitudes toward human behavior in general, are still strongly rooted in the traditional Oriental culture (Nivison & Wright, 1959).

In order to better understand Asian Americans in the

United States, demographic characteristics and market research on Asian Americans need to be reviewed.

Ethnic Groups and Population Projection

During the past fifteen years, immigrants of Asian ancestry have been arriving in the United States in phenomenal numbers. According to the most current data available (U.S. Department of Commerce, 1987), immigrants from Asia accounted for 50 percent of all alien immigrants in 1983. Asian Americans from the traditional sending countries of China (including Taiwan), Hong-kong, Japan, Korea and the Philippines are well represented. Refugees-turned-immigrants from Vietnam, Kampuchea and Laos, however, represent another new and important proportion of the Asian immigrant stream (Gould, 1988; Nee and Sanders, 1985; Patel, 1988; Robery, 1985; Wong, 1986).

The major ethnic groups of Asian Americans in 1985 were Chinese (21%), Philippino (20%), Japanese (15%), Vietnamese (12%), Korean (11%) and Asian Indian (10%). Asian Americans include a number of diverse ethnic groups who differ in language, nationality, recency of immigration and socioeconomic achievement (Patel, 1988).

Asian Americans, in the 1980's, have had growth rates higher than either black or white Americans. It is immigration that is principally responsible for the high growth rate. This population group grew from 5.2 million to 7.1 million, or 37.5 percent, between 1980 and July 1, 1985

(U.S. Department of Commerce, 1987).

The U.S. Bureau of the Census projected that Asian Americans (including Other races) together with Hispanics and blacks will continue to increase during the next century. The Asian and Other races population was projected to increase from 6.4 million to 23.4 million in 2080, or from 2.7 percent in 1985 to 7.5 percent in 2080 (U.S. Department of Commerce, 1987).

The Asian American population is highly concentrated regionally. About 52 percent of the total Asian population, compared to about 28 percent of the U.S. population, resides in the western states. Five states (California, Hawaii, New York, Illinois and Washington) are home to about three-quarters of all Asian Americans (Bouvier & Agresta, 1985).

Scholastic Achievement

Recent Asian immigrants merit attention, not only because of their increasing numbers, but also because of their scholastic and socioeconomic achievement. They tend to be more educated and more likely to be in professional and managerial occupations than either other immigrants or native-born Americans (McLeod, 1986).

According to the 1980 Census, Asian Americans are a very highly educated population. The proportion of Asian immigrants with college degrees and with postgraduate training is almost double the proportion for the total U.S. population. Among Asian immigrants, those from China,

Japan, Korea and the Philippines have a much higher proportion of college degrees than immigrants from Vietnam, Kampuchea and Laos (Gould, 1988; Wong, 1986).

Another indicator of educational achievement is the mean number of years of schooling completed. Post-1965 Asian Americans completed about two more years of schooling than U.S. native-born counterparts (Wong, 1986). Moreover, it was reported that, by the mid-Eighties, Asian Americans had come to represent about 10 percent of the student body at prestigious schools such as Harvard and Brown, and about 20 percent in California schools, such as Berkeley ("Quotas on... ", 1989). Asian Americans are also accomplished in more than science and math, they represent a quarter of the students at the Juilliard School of Music in New York (Gergen, 1988).

Occupational Status

Partly as a consequence of their higher educational achievements, Asian Americans tend to be slightly more advantaged occupationally than their American counterparts. About 22 percent of Asian Americans, compared to 13 percent of the U.S. population, are involved in professional occupations (Wong, 1986). Another indicator of occupational advantage is the proportion involved in white-collar occupations. From 62 to 77 percent of the Chinese, Japanese, Korean and male Filipino Americans are involved in white-collar occupations, compared to about 46 percent of

the U.S. population (Wong, 1986).

Economic Achievement

Based on the 1980 census information, the average family income of Asian Americans (US \$23,600) exceeded the level (US \$19,000) reported for whites (Foote, 1987). However, both Wong (1986) and Gould (1988) argued that this one-sided viewpoint was misleading. Instead of analyzing income by family, Wong analyzed the Asian American income by individual. It was found that in terms of total income per capita, Asian immigrants tended to earn less than their white American counterparts. The family income of Asian Americans is higher than that of the general U.S. population due to multiple workers in the Asian household.

Zinsmeister (1988) also reported that Asians averaged more workers per family (2, versus 1.5 for non-Asians) and that they worked longer hours or that Asian Americans had higher than average levels of education. Therefore, the relatively high earnings of Asian American households are a function of their high levels of training, effort and number of workers per household.

Manning and O'Hare (1988) reported that Asian Americans were more likely to own a business than were other minorities. For every 1,000 Asian and Pacific Islanders in the population, 54.8 owned a business, far above the rate for blacks (12.5 per 1,000) or for Hispanics (17 per 1,000) (Manning & O'Hare, 1988).

Market Research on Asian Americans

In the early 1980's, some insurance companies, consumer goods manufacturers and Asian-oriented media started tapping the Asian market. As one of the pioneers in targeting Asian Americans, Metropolitan Life Insurance, Inc. (Met Life) conducted focus group research with Asians. Met Life found that Asian families routinely save as much as one-fifth of their income and follow time-honored traditions of respect for elders and love of children, which is referred as "the finest quality market an insurance company could hope for" ("Asian-Americans...", 1986, p.34).

In spite of the diversity of ethnic groups among Asian Americans, Met Life discovered from their research that Asian Americans were similar to each other and in many ways. The most noteworthy similarity is that Asian Americans are family oriented, with a strong need to protect their survivors and educate their children. The powerful traditions of respect for elders and love of children observed in the Far East have largely been continued in the U.S. ("Asian-Americans..." , 1986).

Zinsmeister (1988) reported that Asian Americans have extremely low rates of divorce and family break-up. Moreover, they are disproportionately likely to live in extended families with relatives. It was also reported that the Chinese preferred shopping in large family groups, with

buying decisions usually made by the family elders (Kotkin, 1987).

Met Life profiled Asian Americans as hard-working, ambitious and knowing little about insurance, which was turned into a market niche by Met Life ("Asian-Americans...", 1986). It was also found that Asian householders might be well educated and hold skilled jobs, but they usually chose conservative savings and investment plans because financial security was of critical importance. Furthermore, Asian Americans tended to buy from people or companies that spoke their language and understood their culture (Edmondson, 1986).

Remy Martin Cognac's success story demonstrated that consumer goods can also profit from targeting the Asian market. Remy reported that a \$400,000 advertising campaign targeted at Chinese Americans doubled its sales; at the expense of Johnnie Walker Red Label, which had been the favorite among the Chinese, since red symbolizes good fortune (Foote, 1987). Remy has been taking great pains to understand the Asian psyche, using advertising messages that stress things like quality, security, family and longevity (Kern, 1988).

Very little market research has been conducted on Asian Americans in relation to their clothing behavior. For example, fashion has been found to be a personal expression for young blacks who select color combinations and fashion-

oriented styling over traditional classics (Less, 1987). Hispanics traditionally like to dress little girls in very feminine fashion and boys in dress-up suits. Hispanics as a group are shorter, and older girls' sizes can be a problem as their figure tend to be heavier and fuller than the middle-American size specification (Less, 1987). However, the Asian market, being viewed as affluent and well educated, has not been explored by the apparel industry (Less, 1987).

Significance of the Study

Very little empirical research has been conducted on Asian Americans as a whole in relation to their consumer behavior, specifically their clothing behavior. A review of literature demonstrates that Asian Americans have been studied from different psychographic and sociological aspects, such as acculturation, family characteristics, socioeconomic status, mental health and counseling practices, self concept and coping behavior. However, the consumer behavior specifically the apparel shopping behavior of this market has received only slight research attention.

Gim (1988) investigated Oriental women's clothing acquisition behaviors and their body measurements. She found that Oriental women were not impulsive buyers and patronized department stores more frequently than other

types of stores. It was also found that fit was the most important consideration for Asian Americans in purchasing a garment.

Another study conducted by Forney and Rabolt (1986) indicated a relationship between ethnic identity and ethnic dress usage. The results suggested that individuals with higher ethnic identities used family, ethnics other than family, ethnic fashion magazines, and ethnic fashion shows as sources of information on dress.

Hoffman (1982) studied the clothing transitions of the Mien, immigrants from Laos (Southeast Asia). The results of her study indicated that Western garb had largely replaced traditional Mien garments for everyday use, except by the elderly. Also dress was found to be indicative of the maintenance of ethnic identity, which meant that the subjects who fully identified (versus partially identified) with the ethnic group used traditional clothing more frequently. Hoffman also concluded that forms transferred before meanings associated with the forms, since incomplete usage of adopted apparel items was found in some cases.

In addition, some studies on Japanese Americans (Robertson, Dalrymple, & Yoshino, 1969), Korean immigrants (Kim, 1987; Kwon, 1982) and Filipino immigrants (Mendoza, 1965; Senga, Brown, & Gonzales, 1987) provide insight into the study of Asian Americans. Given these research findings, the questions of whether Asian Americans, in

general, behave differently from the major Caucasian American market in shopping for apparel and how they differ remain unanswered. Therefore, to study Asian Americans in regard to apparel shopping behavior will add to the body of knowledge on Asian Americans. The findings will also provide apparel manufacturers and retailers some basis for the development of marketing strategies to attract the Asian American market.

To explore the Asian American fashion market, shopping orientations provide a general but practical perspective. Shopping orientation is a concept first proposed by Stone in 1954. Studies of consumer shopping orientations typically seek to identify a limited set of distinct shopper types to which retail management may direct differentiated marketing efforts (Westbrook & Black, 1985).

Shopping orientations have been found to be good predictors of various aspects of shopping behavior (Darden & Reynolds, 1971) and a better, than personality, for example, objective way to describe consumer characteristics (Wilson, 1966). Moreover, researchers have suggested that shopping orientations could be used as a basis for market segmentation and marketing planning (Boone, Kurtz, Johnson, & Bonno, 1974).

One dimension of investigating consumer shopping orientations is to identify differences in shopping orientation patterns between different ethnic groups, such

as Hispanics compared to Caucasians (Valencia, 1982) or Korean immigrants compared to whites (Kim, 1988). However, most of the studies are about general shopping orientations and do not specifically examine apparel shopping orientations. Moreover, no research could be found that compared differences in apparel shopping orientations among Asian Americans and other ethnic groups.

When using ethnicity as an independent variable to study consumer behavior, it was found that within the same ethnic group there are differences between individuals of varying intensity of ethnic identification (Hirschman, 1981; Deshpande, Hoyer & Donthu, 1986). Intensity of ethnic identification refers to how strong an ethnic member identifies with the ethnic group. The concept of intensity of ethnic identification leads to the belief that there must be a relationship between the intensity of identification and consumer behavior.

Deshpande et al. (1986) suggested that, in reality, the intensity of ethnic identification is a continuum. However, they found empirical support for classifying subjects into two levels of identification, strong and weak identifiers. The level of ethnic identification influences the values and norms being held, which in turn influences the overt consumer behavior, such as shopping behavior (Hutnik, 1986). Hence, besides comparing Asians to Caucasians in regard to their apparel shopping orientations, correlation between

apparel shopping orientations and different levels of ethnic identification among Asian Americans may also be found.

In conclusion, the purpose of this study was two-fold. Practically and managerially, it would assist apparel manufacturers and retailers to better understand the Asian American market and to develop marketing strategies. Academically, it added to the body of research on Asian Americans as well as apparel shopping orientations relating to different ethnic groups.

Definition of Terms

The following definitions are relevant to this study:

Asian American - According to the 1980 U.S. Census definitions of subject characteristics, the category "Asian and Pacific Islander" includes American citizens who indicated their race as Chinese, Filipino, Japanese, Asian Indian, Korean, Vietnamese, Hawaiian, Samoan, Guamanian, Cambodian, Laotian, Pakistani, Fijian and the ones under "Others" race category.

The concept of race as used by the Census Bureau reflects self-identification by respondents; it does not denote any clear-cut scientific definition of ethnic groups. These data represent self-classification by people according to the race with which they identify (U.S. Department of Commerce, 1984). The definition for Asian Americans in this

study followed 1980 Census definition of "Asian and Pacific Islanders".

Caucasian Americans - Caucasian Americans were defined as white Americans who were of white race or European descent. Respondents who identified themselves as "Caucasians" and "Americans" were included in this study as Caucasian Americans.

Culture - Culture refers to the complex of values, ideas, attitudes and other meaningful symbols created by a group of people to shape human behavior and the artifacts of that behavior as they are transmitted from one generation to the next (Engel, Kollat and Blackwell, 1973, p. 72).

Ethnicity - The term "ethnicity" refers to shared culture and background. Shared background includes common ancestry and the shared culture embraces language, religion, customs and national or political identification (Bahr, Chadwick & Stauss, 1979).

Intensity of ethnic identification - refers to a subjective, self-reported intensity of identification with a specific ethnic group.

Shopping orientation - Shopping orientation refers to motivations for shopping, attitudes toward and interest in shopping (Howell, 1979; Valencia, 1982).

Apparel - Broadly defined as any body covering, which includes clothes as well as other forms of adornment.

CHAPTER II

REVIEW OF LITERATURE

This chapter reviews relevant literature and research. The following four topics are covered: culture, ethnicity, and clothing behavior, intensity of ethnic identification, Asian Americans and shopping orientations. In the end, the shopping orientations used in this study are specified and discussed.

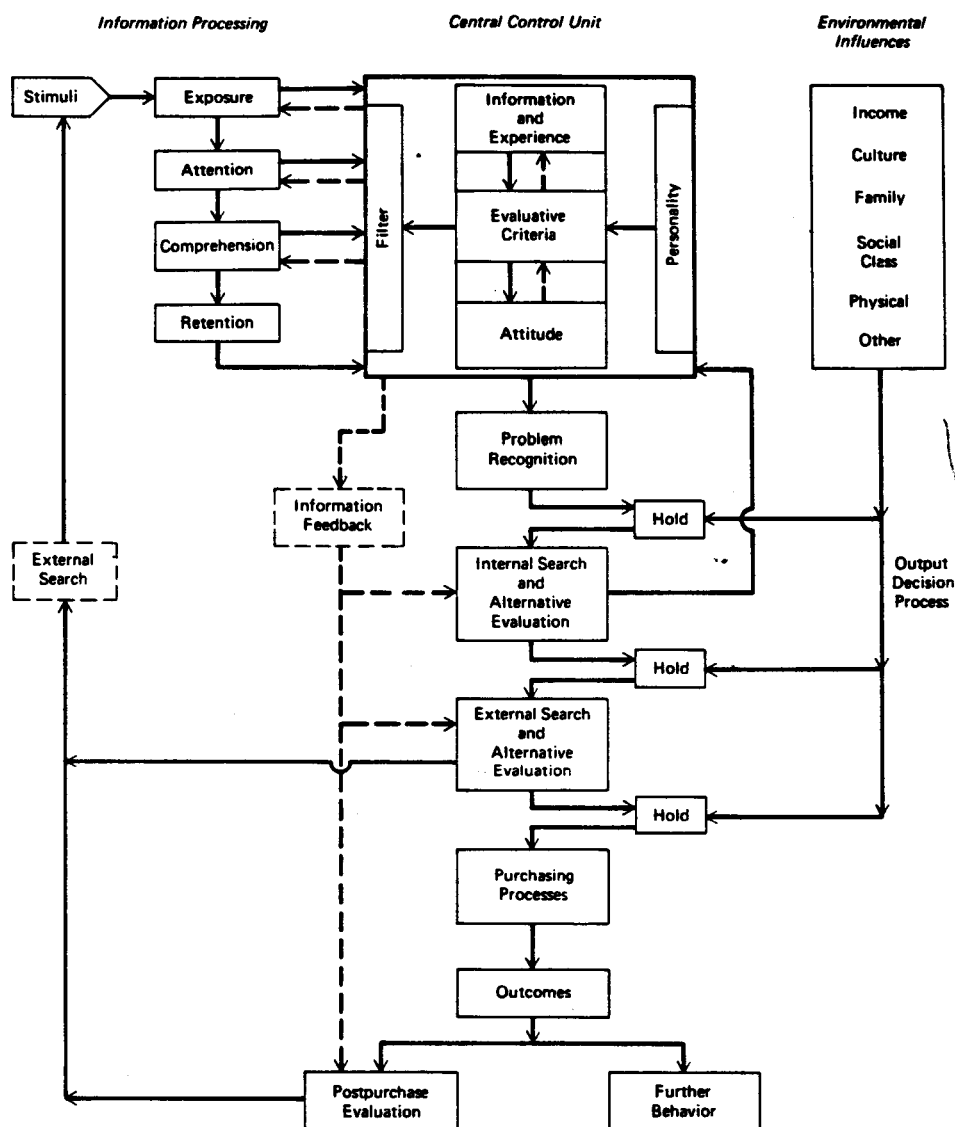
Culture, Ethnicity And Clothing Behavior

The multimediation model of consumer behavior proposed by Engel, Kollat and Blackwell (EKB model) (1973) was used as a theoretical framework for this study. Figure 1. is an illustration of the complete EKB model.

The term "multimediation" as applied to this model of consumer behavior refers to the fact that many processes intervene or mediate between exposure to a stimulus and final outcomes of behavior. The EKB model suggests that four types of variables affect the extent of decision-making. They are situational variables, product characteristics, consumer characteristics and environmental factors. As one characteristic of environmental factors which influence consumer behavior, culture was the focus of this study.

Figure 1

The EKB Model (Engel et al, 1973, p.58)
 Complete Model of Consumer Behavior Showing
 Purchasing Processes and Outcomes



In this model, culture plays an important role in influencing consumer behavior. Culture refers to

...the complex of values, ideas, attitudes, and other meaningful symbols created by men to shape human behavior and the artifacts of that behavior as they are transmitted from one generation to the next. (p. 72)

Engel et al. (1973) stated that culture is the underlying determinant of human decision-making. A realistic analysis of consumer behavior must include understanding of the cultural context which molds human desires and shapes human decision-making. Based on the theoretical framework of the EKB model, it is expected that people of different cultural backgrounds are different in terms of their consumer behavior.

As one of the social and cultural influences, ethnicity exerts influence on consumer behavior. Engel, Blackwell and Miniard (1986) further explored ethnicity as a sub-culture, although the term "sub-culture" was avoided because of the connotation of "sub" with "inferior". The norms and values of specific groups within the larger society are called ethnic patterns. Individual consumers may be slightly influenced through identity with ethnic groups or the ethnic group may be a dominant force on the life style and consumption patterns of an individual (Engel, Blackwell & Miniard, 1986).

The term "ethnicity" refers to shared culture and

background (Bahr, Chadwick, & Stauss, 1979). Ethnic groups may be formed around nationality, religion, physical attributes, geographic location or other factors (Engel, Blackwell and Miniard, 1986). The essential determinant of ethnic group membership is social identification. If the group identifies a person as similar enough to belong to it, and if that person identifies with that group, then he or she belongs to that group, whatever his or her real ancestry may be (Bahr, Chadwick, & Stauss, 1979). Hence, an ethnic group may include members of various racial or nationality groups (McDonagh & Richards, 1972).

Many studies have focused on the relationship between ethnicity and consumer behavior (Choe, 1984; Feldman & Star, 1968; Gillett & Scott, 1974; Henry, 1976; Hirschman, 1981). The investigation conducted by Hirschman (1981) clearly indicated that ethnicity (Jewish or otherwise) is a variable of potential influence on marketing and consumption. The more an individual consumer identified with an ethnic group, the greater the influence was likely to be. Hirschman further suggested that marketers who desire to understand consumers in a more predictive and comprehensive manner may find it useful to view ethnicity as a determinant of consumption patterns.

According to Engel, Blackwell and Miniard (1986), values are "...shared beliefs or group norms that have been internalized by individuals." (p. 363). As values affect

behavior and the decisions an individual makes, the study of values is also of interest to researchers who wish to understand particular aspects of behavior, such as clothing behavior. Creekmore (1963) completed an exploratory study in regard to clothing behavior, human needs and general values. The results showed that clothing behavior and attitudes were related to certain needs and certain general values.

Blumer's (1969) human collective theory suggests that fashion is a process of collective selection and formation of collective tastes among a mass of people. Blumer also argued that fashion leadership is no longer confined strictly to the upper class. In her book of The Social Psychology of Clothing, Kaiser (1985) stated:

The purchase and use of clothing (symbolic consumption) by collective groups of people largely reflects cultural norms and social values. Clothing norms are forms of collective behavior....Collective clothing behavior has implications for the manufacturing and marketing of apparel products, as well as for a basic understanding of cultural aesthetics.(p. 9)

It has been widely accepted that dress varies from one culture to another (Roach & Eicher, 1965). Cultural values are expressed through material objects, such as clothing. Clothing can be a valuable tool in the study of different cultures. Conversely, culture or ethnicity can be used as a variable to study clothing behavior. Clothing values have been shown to be positively related to general values, and

also have been shown to influence clothing interest and selection (Creekmore, 1963; Lapitsky, 1961). Ryan (1966) noted that:

Values are derived from an individual's experience, part of which is determined by the culture in which he lives. Thus certain values will be commonly held by members of a specific culture.... and they operate in determining clothing choices and clothing behavior. (p.98)

Therefore, shopping for apparel is one type of behavior that is part of an overall life pattern; it reflects attitudes toward fashion, shopping behavior and store patronage, as well as, broader values and interests (Tatzel, 1982).

In a qualitative research study on the Karen, a tribe in northwest Thailand, Hamilton and Hamilton (1989) described Karen dress in relation to culture. The data were collected in a field study from 1959 to 1960. The results suggested that dress may serve as a symbolic metaphor of the relationship of the individual to the cultural system.

In a cross-cultural study comparing Korean and American fashion leaders, Schrank, Sugawara and Kim (1982) sampled college women in Korea and the United States respectively. The results implied that there were different attitudinal and socioeconomic characteristics between these two samples despite their similar fashion leadership characteristics.

Chen (1970) compared clothing attitudes of a group of female college students at National Taiwan University and Pennsylvania State University respectively. Also Chen

explored the relationship between rigidity and clothing attitudes. Rigidity was defined in her study as the "...relative inability to change one's action or attitude when the objective conditions demand it." (p.72). The results showed that the Chinese group was more conforming, conservative and in favor of expressing status through clothing and also in favor of less exposure of the body than the American group.

Chowdhary and Dickey (1988) examined the concept of fashion leadership among college women in India by assessing the attention given to media exposure. The sample consisted of 509 college women from four universities in northwestern India. The findings revealed that fashion opinion leaders used significantly more sources of fashion information and more often than nonleaders. Most of the findings were consistent with Western literature regarding the fashion adoption process. But the author concluded that the role of parents and family members in legitimating the fashion choices of the respondents did reflect a cultural difference.

The black ethnic group has received the most research attention in the U. S. in regard to clothing. Previous research has suggested that black consumers were more fashion-conscious, more fashion-innovative, and more likely to be fashion opinion leaders than whites. After two decades since the pioneering studies were conducted, legal,

social, and economic changes may have altered these relationships (Goldsmith, Stith, & White, 1987).

Goldsmith, Stith and White (1987) re-examined sex and racial influences on fashion attitudes. The findings suggested that within the middle class, levels of fashion consciousness and fashion innovativeness in blacks and whites may be closer than they were in the past. The results also supported the generalization that middle-class blacks are no more innovative than middle-class whites.

The authors also suggested that a linear measurement of ethnicity, rather than the categorical measure of race, should be included. The measurement of ethnicity can lead to finer segmentation than the categorical measure of race. Ethnicity allows the researcher to measure a deep feeling and value orientation toward oneself.

Dardis, Derric and Lehfeld (1981) investigated the factors influencing clothing expenditures by households in the United States using the data from the 1972-1973 Bureau of Labor Statistics Consumer Expenditure Survey. The results indicated expenditures were positively related to income and education and negatively related to age of household head. Also ethnicity was found to be a major variable. Households headed by non-blacks, other variables held constant, spent from 20 to 30 percent less on clothing than did households headed by blacks.

Besides the cross-cultural studies of people in

different countries, an understanding of clothing behavior would be enhanced by examining the clothing behavior of different ethnic groups that have migrated to another country (Senga, Brown, & Gonzales, 1987). Senga, Brown and Gonzales assessed the relative importance of culture as an influence on clothing values by sampling 500 Filipino women in Winnipeg, Canada.

The results demonstrated that culture is one of the social variables that influences individual decision-making and clothing values. The results were further compared to Mendoza's (1965) cross-cultural study regarding clothing values and general values of women attending the Filipino University in the Philippines. With a time lapse of 20 years between these two studies, the values of the Filipinos in Canada were quite similar to those of the Filipino University women in the Philippines. This similarity was explained by the authors to be a result of much western influence in the Philippines. Therefore, cultural changes after immigration were not marked.

Hoffman (1982) studied the clothing transitions of the Mien, who immigrated from Laos (Southeast Asia) and settled in Portland, Oregon. The purpose of her study was to provide historical documentation of a unique period of transition in Mien history as well as to explore the interplay between dress, ethnicity and acculturation. Literature survey, questionnaire, open-ended interview and

participant observation were used as methods to collect data on thirty Portland Mien subjects.

The results of Hoffman's study indicated that the Western garb has largely replaced traditional garments for everyday use by all Portland Mien, except the elderly. Also dress was found to be indicative of the maintenance of ethnic identity, which meant that the subjects who fully identified (versus partially identified) with the ethnic group used traditional clothing more frequently. In her study, ethnic identification was measured by religion, holiday celebration, food preference, household living patterns and English proficiency.

Also, the results of Hoffman's study supported the acculturation theory proposed by Linton (1945) that tangible objects were more easily adopted than intangible things such as patterns of behavior. In some cases, incomplete patterns of usage of adopted elements were observed. For example, wristwatches, were worn without use as a timing mechanism; shoes were worn, not to protect the feet but to impress onlookers. Therefore, the researcher concluded that forms may be transferred before meanings associated with the forms.

Sletten and Petrich (1983) investigated clothing problems as perceived by Mexican American migrant women. Personal interviews were conducted throughout Wisconsin, Minnesota and North Dakota. Six general problem categories

were established and a questionnaire was designed to obtain data. The study revealed that the perceived problem category that Mexican migrants encountered most often was "quality" and they needed more knowledge and skill to identify quality of clothes. However, overall, Mexican migrant women did not perceive themselves as having encountered many clothing problems.

Clothing practices of Korean female immigrants in Chicago were studied by Kwon (1982). The data were collected from 219 Korean female immigrants in Chicago. The results revealed that the frequency of usage of western dress over Korean traditional dress was significantly related to pre-immigration factors, such as level of education and work experience in Korea. The transition from Korean made dress to American dress was found to be significantly related to the post-immigration factors, such as work experience and number of years of stay in United States. These findings suggested that the sudden change of cultural environment has a definite impact on the abandonment of Korean traditional dress.

Intensity of Ethnic Identification

Cross-cultural studies in the U.S. often pre-select the ethnic groups and simply assign subjects into them (Tan & McCullough, 1984). The common assumption is that subjects

of an ethnic group are alike in cultural values and orientation, and they are different from subjects of another ethnic category (Tan & McCullough, 1984). Such an assumption is easily challenged. Linton (1945) pointed out:

Actually, it would be impossible to find any element of culture which had been shared by all members of a society throughout that society's entire duration. Cultures change and grow, discarding certain elements and acquiring new ones in the course of their history. (p. 36)

Prior research concerning the effects of ethnicity upon consumer behavior may be characterized as primarily descriptive in nature and having inadequate controls for the degree of ethnic identification (Hirschman, 1981).

Hirschman (1981) tested five hypotheses concerning Jewish ethnicity. The subjects were asked to indicate how strong their identification was with the group they had identified using a five point scale ranging from very strong to very weak. Moreover, subjects were asked to indicate with which of five religious categories they were affiliated.

Therefore, ethnicity was measured multi-dimensionally for each individual, first as ethnic/racial identification and second as religious affiliation. Further, degree of ethnicity as perceived by the individual was measured for both dimensions.

The data suggested that the higher one's Jewish ethnicity, the greater the adherence to norms favoring innovativeness and the higher the level of innovativeness

expressed by the individual. It was also concluded that ethnicity, Jewish, or otherwise, should perhaps be viewed as a variable having large potential influence on marketing and consumption.

Tan and Farley (1984) studied the relationship between ethnic attitudes and consumption values in a Chinese society of Singapore. By the researchers' observation, consumers in Singapore can be divided into the more traditionally Chinese shoppers versus those that are more Westernized. It was proposed by the authors that the "more Chinese" consumers are thrifty, quality minded, spend less on conspicuous items and shop more at stores that carry Chinese goods. On the contrary, the "more Westernized" Chinese consumers tend to be sophisticated, brand name conscious and have shopping habits more like their Western counterparts.

The researchers conducted a survey of 132 subjects in Singapore. Several questions regarding one's attitudes toward tradition and Confucian norms were included to measure ethnicity. The Rosenberg expectancy-value model was adopted in this study to measure value importance of four product attributes: price, quality, brand image and convenience (brand availability).

The results of the study indicated that price and image attributes exhibit significant overall differences between low ethnic attitude and high ethnic attitude groups. In general, the low group or those more Westernized, place

greater value on image and convenience importance. The high group or those more traditional in Chinese values, placed more importance on price and quality. The results of this study suggested that within a given ethnic group there will be differences in consumption values. To conclude, Tan and Farley invited more research on differences in actual consumption patterns within an ethnic group.

Recognizing the fact that there was no measure of the intensity of affiliation with an ethnic group, Deshpande, Hoyer and Donthu (1986) studied the sociology of Hispanic consumption with the intensity of ethnic affiliation. The concept of intensity of ethnic identification leads to the belief that consumption-related differences might exist between strong or weak identifiers.

In their study, ethnicity was operationalized with two questions. First, subjects were asked to indicate the ethnic or racial groups to which they belonged. Second, they were asked to indicate how strongly they identified with this ethnic group. Accordingly, subjects were classified as strong Hispanic identifiers or weak Hispanic identifiers with very few respondents falling in the middle of the five-point scale.

The results appeared to confirm the importance of using the intensity of ethnic identification as a measure of ethnicity. Not only were there the expected differences between the dominant Caucasian group and the entire Hispanic

group, but the latter group itself was found to be heterogeneous. Differences between Hispanics appeared to be especially strong in terms of their attitudes toward institutions, use of Spanish-language media, brand loyalty and preferences for prestige and ethnically advertised brands. To some extent, there appeared to be more similarity between weak Hispanic identifiers and Caucasians than between the two Hispanic groups.

Asian Americans

A major portion of the research on Asian Americans has investigated psychological or sociological aspects. Asian Americans have been studied on various topics, such as immigration history, assimilation, academic achievement, socioeconomic achievement, residential segregation, self concept, sexual experience and attitude, family characteristics, labor force participation and counseling practices. Other cross-cultural research studies have been conducted to compare Asian Americans with other ethnic groups, such as whites, blacks or Hispanics (Hirschman & Wong, 1984; Thornton & Taylor, 1988).

For example, in a study examining the passive-methodical image of Asian American students, Bannai & Cohen (1985) found that Asian students were better listeners, better organized in what they said and more tolerant of

differences, but less capable of leadership and verbal communication. By comparing family characteristics of Asian American and white high achievers, Yao (1985) concluded that the family life of Caucasian-American students tended to be less structured and provided less formal educational experience for children after school and on weekends.

There has been limited research on the consumer behavior of Asian Americans as a group. Gim (1988) investigated Asian women's clothing acquisition behaviors and compared their body measurements with the measurements listed in the Voluntary Product Standard, PS 42-70, which is a set of body measurements published by the Bureau of Standards to aid in consistent sizing of women's ready-to-wear apparel.

In Gim's study, a questionnaire was administered to 101 Asian women residing in Tucson, Arizona. The results suggested that Asian women patronized department stores more frequently than other types of stores. The study also found that Asian women were not impulsive buyers or influenced by suggestive selling techniques. Fit was the most important consideration in purchasing a garment and newspapers were the major information source of apparel fashion for Asian women.

Gim's (1988) study also showed significant fitting problems in garment length when Asian women purchased ready-to-wear clothing. Larger differences were found in the

vertical than in the circumference body measurements for Asian women when the means of those body measurements were compared with those of the PS 42-70 measurements.

Forney and Rabolt (1986) conducted a study on the relationship between ethnic identity and contemporary dress. This study investigated ethnic identity as it relates to traditional ethnic dress patterns, and use of ethnic reference persons and ethnic market sources as information on contemporary dress. A sample of 117 students identifying with one of seven ethnic groups was analyzed as a pooled group with separate analyses for the Chinese and Japanese.

Results indicated a relationship between ethnic identity and ethnic dress usage. Individuals with higher ethnic identities used family, ethnics other than family, ethnic fashion magazines, and ethnic fashion shows as sources of information on dress. No significant differences were found between the Chinese and Japanese with their use of ethnic reference persons and ethnic market sources as information on dress.

Although the study of Asian Americans' clothing behavior has received only slight attention, the studies of Japanese, Chinese, Filipino and Korean Americans' general consumer behavior provide valuable insight into Asian Americans shopping behavior. In a study comparing blacks', Japanese-Americans' and whites' adoption patterns for three product categories - food, clothing and appliances;

Robertson, Dalrymple & Yoshino (1969) found that high-income Japanese Americans were most likely to be small appliance innovators. Conversely, low income Japanese-Americans and blacks were more likely to buy food innovations than were high income consumers in these categories. In general, whites appeared to own more total innovations, followed by Japanese-Americans and then blacks.

Shopping Orientations

Another theoretical framework used in this study was the concept of shopping orientation, introduced by Stone (1954). In his pioneering study on city shoppers and urban identification, Stone categorized urban shoppers by four types of shopping orientations: economic, personalizing, ethical and apathetic. Stone (1954) defined orientation as "the theme underlying the complex of social roles performed by an individual" (p. 37).

Using in-depth interviews with 124 female department store shoppers, Stone found that each type of shopper is distinguished by a specific pattern of social characteristics reflecting her position in the social structure of her residential community. Economic shoppers were characterized by a careful approach to shopping, giving more attention to merchandise variety, price and quality. Personalizing shoppers appeared to seek personal

relationships with retail personnel. Ethical shoppers were found to be more willing to sacrifice lower prices and wider assortments to behave consistently with moralistic beliefs, such as "helping little retailers". Finally, apathetic shoppers were not interested in shopping and viewed shopping as a necessity. In an attempt to supplement the theories on urban identification, Stone suggested that personalizing shoppers drew on their relationships with clerks to form subjective identifications with a community.

In order to measure buyer attributes more germane to the purchase situation, shopping orientations were studied in relation to shopping behaviors, such as product usage rates (Darden & Reynolds, 1971), uses of information (Moschis, 1976) and store patronage (Darden & Ashton, 1974-1975; Stephenson and Willett, 1969). In an analysis of consumers' shopping and patronage behavior, Stephenson and Willett (1969) presented a taxonomy of consumers shopping styles by four orientations: store loyal, convenience, compulsive/recreational and price/bargain conscious.

Different from the previous study, in which shopping orientations were determined by shoppers' attitudes, feelings and opinions, the orientations Stephenson and Willett proposed were based upon actual patronage and shopping behavior. Their study focused on six product categories. Personal interviews, telephone interviews and mail questionnaires were used as data collecting methods.

In their study, the data collected from the subjects included: the specific store patronized, dollar value of the purchase, method by which the purchase was paid, whether the item(s) was/were on sale, etc. The focus of the study was the relationship between shoppers' orientations and the major transaction characteristics, such as method of payment. The authors concluded that by studying the differences among consumer's shopping orientations, instead of their demographic and psychographic characteristics, a meaningful relationship between shopping orientations and patronage behaviors could be established.

Darden and Reynolds (1971) explored the importance of shopping orientations to patterns of product usage. One hundred and sixty seven housewives of middle to upper middle class in Athens, Georgia were sampled. Data were collected on the usage rates of twelve health and personal care products. Psychographic scales were developed to measure five shopping orientations. The results indicated that economic shoppers had high usage rates of products which were socially visible or produced socially visible effects, such as liquid face makeup base and hair spray. Apathetic shoppers used a lot of medicated face makeup base and hair shampoo and were less likely to use hair spray or cream deodorant.

Moschis (1976) investigated six shopping orientations in relation to six functional variables of communication

behavior. The six shopping orientations were: special shopper, brand-loyal shopper, store-loyal shopper, problem-solving shopper, psycho-socializing shopper and name-conscious shopper. The six functional variables were sources of information, source credibility, preferences for kinds of information, quality of media used and types of media used.

It was found by Moschis that shoppers possessing different orientations exhibited different communication behavior. It was concluded that the concept of shopping orientation can be used to segment a market and is a valuable approach to retail strategy formulation.

Darden and Ashton (1974-1975) explored another aspect of the interface between shopping orientation and store patronage. It was hypothesized that there were groups of shoppers with distinctly different supermarket attribute preference profiles, and those attribute preference groups had different shopping orientations. As a result, six preference groups were identified and the data indicated that traditional marketing variables, such as age, education and income were not significantly different among the seven preference clusters. The results showed that patronage can be segmented by store attribute preferences and that these preference groups have different shopping orientations.

Different from the previous studies, in which shopping orientations were defined or measured by shoppers'

attitudes, feelings, opinions or patronage behavior, Westbrook and Black (1985) developed a motivation-based shopper typology. The authors proposed a theoretical model of shopping motivations. The authors stated that motivations are relatively enduring characteristics of individuals, hence manifesting themselves on a regular basis over a wide range of shopping occasions.

In their study, personal interviews were conducted with a sample of 203 adult female shoppers of department stores in Tucson, Arizona. Structured questionnaires were administered by trained professional interviewers. Operational definitions for underlying motivations were the levels of satisfaction received by consumers from various outcomes and aspects of shopping behavior.

The analysis of the data suggested seven motivation-based shopping orientations: anticipated utility of prospective purchases, enactment of an economic shopping role, negotiation to obtain price concessions from the seller, optimization of merchandise choice in terms of matching shoppers' needs and desires, affiliation with reference groups, exercise of power and authority in marketplace exchanges and sensory stimulation from the marketplace itself. While modestly successful in confirming the existence of theoretically rooted dimensions of shopping motivation, the authors also pointed out the difficulty of measuring shopping motivations.

In order to develop a "policy" oriented typology of shoppers, a study was conducted by Williams, Painter and Nicholas (1978) to examine grocery shoppers with four shopping orientations: involved, convenience, price and apathetic. The four orientations stem from customer involvement along either the "price" or "customer service" store policy dimensions. In this study, four major types of shoppers were identified with each group representing a unique shopping orientation.

Owing to the changing consumer and environment, Bellenger and Korgaonkar (1980) added another dimension, recreational shopping, to the shopping orientations postulated by previous studies. It was suggested that viewing shopping orientations in terms of alternative uses of time and preferences may be very helpful in classifying shoppers and can be generalized across different retail settings.

Holbrook and Hirschman (1982) also recognized the important experiential aspects of consumption. Since the study of consumer behavior has evolved from an early emphasis on rational choice (microeconomics and classical decision theory), phenomena including various playful leisure activities, sensory pleasure, daydream, aesthetic enjoyment and emotional responses had been ignored. In contrast with information processing models, Holbrook and Hirschman recognized and focused on the symbolic, hedonic

and aesthetic nature of consumption. This view regards the consumption experience as a phenomenon directed toward the pursuit of fantasies, feelings and fun.

Bellenger and Korgaonkar (1980) took the time-related shopping orientation into account and suggested a two-fold shopping orientation: economic (convenience) versus recreational. Recreational shoppers were defined as those who enjoyed shopping as a leisure-time activity. Shopping enjoyment was used as a dependent variable in their study and 69 percent of the 224 respondents fell into the recreational shopper segment. The researchers concluded that it could be a significant force in the retail market. The analysis also showed that recreational shopping and information seeking were closely associated.

Korgaonkar (1981) was the first to study a specific type of retail institution in relation to general shopping orientations. In the 1970s the catalog showroom experienced rapid sales growth. Korgaonkar studied and developed a profile of catalog showroom patrons based on customers' general shopping orientations and the showroom's method of operation. The results indicated that catalog showrooms were successful in attracting economic shoppers, rather than recreational shoppers.

Among all the shopping orientations suggested by various studies, convenience-oriented consumers were singled out and studied by Anderson (1971). Convenience-oriented

consumers were identified by patterns of convenience food consumption and use of durable goods. It was concluded that consumers with convenience orientation can be identified. Second, stages in the family life cycle and socioeconomic status are significant determinants of convenience orientation. Third, annual family income alone is not sufficient to explain convenience orientation.

"Deal-prone" consumers were studied by Webster (1965). Deal orientation was defined as a function of both the consumer's buying and the frequency with which a given brand is sold on a deal or bargain basis. In this study, the measure of consumer deal orientation was developed and then the measure was analyzed in relation to families' demographic, socioeconomic and purchasing characteristics. The results obtained, accounted for only a small amount of the variability in deal orientation. The results also indicated that deal-orientation tended to increase with age and high-deal oriented consumers switched brands more frequently.

Taking spatial aspects of consumer shopping behavior into consideration and identifying outshoppers as one type of shoppers, Darden and Perreault (1976) studied outshoppers by various outshopping orientations. Based on the broad definition of outshopping as shopping outside town, the authors operationalized outshopping by types of purchases and their dollar magnitude. Outbuying behavior across 13

product categories was analyzed to determine whether there were natural outshopping types. Five outshopping groups were suggested in this study and outshoppers were found to be, in general, more fashion conscious and demonstrated greater patronage innovative behavior.

To examine the perceptual and preference dimensions of television programming, Lumpkin (1980) related television preference viewing to shopping orientations and life-styles. One of the objectives of the study was to identify segments which have similar television program preferences and investigate how these preference groups differ with respect to shopping orientation and life-style.

The data was gathered through the Arkansas Household Research Panel using a self-administered questionnaire. Multivariate Analysis of Variance indicated that the preference groups differed with respect to life-styles and demographics but not in shopping orientations. These results suggested that there was not a direct link between shopping orientations and television viewing.

Miller (1982) studied sex-role orientation (SRO) in relation to shopping and lifestyles. Since marketers had been convinced that a relationship exists between sex-role and various aspects of buyer behavior, one of the purposes of Miller's study was concerned with how SRO relates to individual shopping orientations.

The analysis of data suggested two different SRO

groupings: the "traditional" and the "nontraditional". The shopping orientations of these two groupings were very different; the "traditional" grouping enjoyed the shopping process, while the "nontraditional " grouping did not. This finding was thought by the researcher to be significant for marketing managers.

In summary, the general goal of shopping orientations research has been to identify a limited set of distinct shopper types to which retailers and marketers may direct differentiated marketing efforts (Westbrook & Black, 1985). Many of these studies have suggested that shopping behavior is better predicted by those measures, which are closer to the marketing function (Stephenson & Willett, 1969; Darden & Ashton, 1974-1975 ; Moschis, 1976).

The orientations which have been used most frequently are: economic, personalizing, ethical, apathetic, store loyal, brand loyal, convenience, compulsive and recreational. It was also demonstrated in many studies (Stone, 1954; Darden & Reynolds, 1971; Moschis, 1976) that shoppers may possess more than one orientation simultaneously.

It was also found that the term "shopper types" was used in many studies interchangeably with "shopping orientations" for the same concept. The bases which were used to determine shopping orientations or shoppers' types include shoppers' attitudes, feelings and opinions, shopping

behavior, psychographic measurement, extent of shopping enjoyment or underlying motivations. The product categories or activity investigated in these studies ranged from individual product classes (e.g., cosmetics), broad product assortments (e.g. grocery products or supermarket products), shopping centers and shopping as a general activity (Westbrook & Black, 1985).

Another dimension of studying shopping orientations has been to compare differences among ethnic groups in their shopping orientations, such as Hispanics compared to Caucasians in the United States (Bellenger & Valencia, 1982; Valencia, 1982) or Korean immigrants compared to whites (Kim, 1987).

Boone, Kurtz, Johnson and Bonno (1974) conducted a cross-cultural experiment based on the Stone (1954) study and the results revealed important variations in shopper orientations. The purpose of their study was to examine similarities and differences that might exist between different ethnic groups (Mexican-American compared to white) residing in different areas of the United States.

A sample of 147 middle-class white households and 317 middle-class Mexican-American households were drawn from two suburban areas of different states: Oklahoma and Texas. A questionnaire containing 13 statements with Likert-type scales was used to measure shopping orientations in the purchase of health and personal care items.

The findings suggested that the percentage of ethical shoppers had decreased during the 20 years since Stone's (1954) study. Moreover, it was found that the differences in shopping orientations between Caucasian and Mexican-American shoppers were striking. The percentage of apathetic and personalizing shoppers among Mexican-Americans was less than that of Caucasian-American shoppers.

Valencia (1982) focused his study on consumer shopping orientations because of the practical and theoretical implications of delineating an ethnic shopper portrait. The purpose of his study was to investigate the consumer behavior of the rapidly growing Hispanic minority in the United States. A cross-cultural sample of 482 respondents were drawn from New York, Los Angeles, Miami and San Antonio using a mail questionnaire. Special procedures were exercised in the research method to ensure cross-cultural comparability of the shopping orientation scales. Additionally, a test for cultural value orientations was conducted to validate the assumption that the two ethnic groups are indeed culturally different.

It was found that Hispanics and Caucasians, as consumer groups, differ significantly in their shopping orientations. The differences in shopping orientations can be attributed to ethnic cultural differences rather than socioeconomic status. Also, it was found that high-socioeconomic and low-socioeconomic status Hispanics and Caucasians differ from

each other along parallel shopping orientations. Moreover, the four major Hispanic subgroups appeared to be heterogenous in their shopping orientations.

Hispanics were reported (Bellenger and Valencia, 1982) to be more likely to shop at smaller stores, dislike impersonal stores and were cautious (do not buy unknown brands). They were less likely to be skeptical of advertisements, were venturesome, impulse buyers, apathetic about shopping and credit card holders.

Another cross-cultural study of shopping orientations was conducted by Kim (1987). This study examined the shopping orientations of Korean immigrants in comparison to that of whites. Eleven specific shopping orientations were used: brand loyalty, national brand proneness, shopping interest, coupon proneness, advertised/special shopper, unplanned purchasing, ethical shopper, shopping center enthusiast, economic shopping, personalizing shopping and shopping sex-roles.

The cross-cultural sample included 147 Korean immigrants and 167 whites and special procedures such as Korean translation and back-translation were exercised to insure the reliability and validity of the measure. The major conclusion was that Korean immigrant shoppers manifested certain shopping behaviors that could be distinguished from that of whites.

Other findings of Kim's (1987) study are as follows:

Korean immigrants had stronger national brand proneness than whites; Whites were more coupon oriented than Korean immigrants; Korean immigrants were more ethically oriented than whites; Korean immigrants more strongly perceived the importance of shopping as a part of the woman's role than whites. Korean immigrants were more interested in shopping at shopping centers than whites.

Shopping orientation has also been used as a tool to study apparel shopping behavior and fashion market segmentation. For example, Lumpkin and Greenberg (1982) investigated the shopping patterns of the elderly by focusing on shopping orientations, information sources and patronage behavior. In this study, a national probability sample was used.

The authors found the shopping orientations of the elderly and the importance they attach to various store attributes provide insight into their shopping behavior patterns. The results indicated that the elderly tended to enjoy shopping (recreational type of shoppers) and enjoyed interacting with store personnel (personalizing oriented). They were not very price conscious and did not have a propensity to shop around compared to their younger counterparts. To the elderly, store reputation was more important than apparel brand name.

An integrative analysis was conducted by Gutman and Mills (1982) studying the relationship between fashion life-

style, shopping orientations, self-concept and demographics as these relate to store patronage and shopping behavior. Sponsored by the Los Angeles Times, around 6300 female subjects responded from eleven major geographic areas of Los Angeles.

One of the four instruments used in this study was the Fashion Life-style Battery composed of "general shopping behavior orientation" and "fashion orientation". The development of the instrument was guided by previous research on the underlying dimensionality of the fashion spectrum and the fashion change-agent process. Seven profiles of target segments emerged as a result of scores on the fashion-orientation factors. The analysis of these fashion segments related self-concept and shopping orientation to store patronage. The results were regarded by the investigators to have immediate, specific applications for fashion retailers.

Shopping Orientations for the Present Study

Today, there is no generally accepted set of shopping orientations (Kim 1987; Valencia, 1982). Many recent studies have selected shopping orientations that are meaningful to the researchers' purposes or that could be applied to test hypotheses derived from prior research (Valencia, 1982).

In selecting the set of shopping orientations for the present study three criteria were used. First, the selected shopping orientations had an empirical research foundation. Second, the selected shopping orientations were judged to be pertinent to apparel shopping. Third, based on previous research findings, the selected shopping orientations were expected to be the ones distinguishing Asian Americans from Caucasian Americans. However, since most of the shopping orientations previously tested were not specifically designed for apparel items, measures of shopping orientations were modified for apparel shopping considerations.

Based on the above criteria, the following seven shopping orientations were selected: economic shopping, personalizing shopping, recreational shopping, brand loyal shopping, social shopping, impulse shopping and fashion orientation. Each orientation and the rationale for selection are discussed below.

Economic Shopping

This shopping orientation is primarily directed to the purchase of the goods. As such, an economic oriented shopper evaluates stores and products (apparel items, in this study), in terms of price, quality, value and merchandise assortment. Store personnel are merely a vehicle for the expedient processing of the sale. This is one of the most widely used shopping orientations in related

research, no matter what category of product was being studied.

Personalizing Shopping

The personalizing shopper is defined as one whose shopping behavior is fundamentally and positively interpersonal (Stone, 1954). Shoppers with this orientation tend to develop personal relationships with store personnel, relationships which in turn determine store selections. Other store attributes are secondary to their personalizing preferences.

This is also one of the most widely used shopping orientations in previous research. In addition, it has been reported that Asian Americans tend to buy from people or companies that speak their language and understand their culture (Edmondson, 1986). Therefore, it was probable that personalizing shopping was one of the orientations that distinguished Asian American shoppers from Caucasians.

Recreational Shopping

This shopping orientation was first proposed by Bellenger and Korgaonkar (1980). Recreational shoppers were defined as those who enjoyed shopping as a leisure-time activity. This orientation can differentiate recreational apparel shoppers (shopping for apparel as fun) from utilitarian or economic apparel shoppers (shopping for apparel as a necessity).

In the present study, this orientation measured the

enjoyment of shopping for apparel. Bellenger and Valencia (1982) found a significant ethnic effect on the shopping interest orientation, which can be interpreted as the recreational orientation in this study.

Social Shopping

This shopping orientation measures the degree of shopping as a social activity. For example, the social shopper is likely to shop with friends, discuss shopping matters with friends and to combine shopping with eating at a restaurant.

It was reported that the Chinese preferred shopping in large family groups, with buying decisions usually made by the family elders (Kotkin, 1987). By examining Asian Americans on this orientation, the above mentioned Chinese shopping habit was studied for its generalizability to all Asian Americans.

Brand Loyal Shopping

Brand loyal shoppers tend to have biased choice behavior toward particular brands of merchandise (apparel) while shopping. Westernman (1989) reported that minority consumers typically had strong brand loyalties and they were willing to pay extra for name brands.

It has been widely argued that Hispanics are brand-loyal because heads-of-households feel pride in providing the best for their families (Passante, 1976). Valencia's (1982) research findings supported the hypothesis that there

were significant differences in patronage loyalty orientations between Hispanics and Caucasian Americans. Black and other low-income groups have generally been described as brand-loyal, possibly as a means to reduce perceived risk (Valencia, 1982). Kim's (1987) study evidenced that Korean immigrants have stronger national brand proneness than whites.

Impulse Shopping

This shopping orientation measures the tendency to buy products (apparel in this study) on the spur of the moment without planning beforehand. This shopping orientation was explored and first proposed by Valencia (1982).

Bellenger and Valencia (1982) found significant ethnic background and income effects on this shopping orientation. In Gim's (1988) study of Oriental female immigrants' clothing behavior, the subjects were found to be less likely to be impulse clothing shoppers. These data indicate strong support for including this orientation in the present study.

Fashion Orientation

This orientation was specifically selected because of the nature of this study. According to Gutman and Mills' (1982) study, "fashion" referred to a set of activities revolving around spending money and other resources to keep up to date with what is fashionable in clothing.

In their study, four factors were identified for fashion orientation: fashion leadership, fashion interest,

fashion importance and antifashion attitude. These factors were used in the present study to examine the subjects' fashion orientation. The following chapter outlines the method being implemented to accomplish the objectives of this study.

CHAPTER III

METHOD

The purpose of this study was to compare apparel shopping orientations of a selected sample of Asian Americans and Caucasian Americans. This study also examined the relationships between intensity of ethnic identification and apparel shopping orientations among a sample of Asian Americans. The method by which the study was conducted is described under the following headings: hypotheses, research design, sample, research instrument, data collection, data analyses and summary.

Hypotheses

The following null hypotheses were developed as a result of the review of literature cited previously:

Hypothesis 1. There are no significant differences in apparel shopping orientations between Asian and Caucasian Americans.

H 1.1. There is no significant difference between Asian and Caucasian Americans on economic shopping.

H 1.2. There is no significant difference between Asian and Caucasian Americans on

personalizing shopping.

H 1.3 There is no significant difference
between Asian and Caucasian Americans on
recreational shopping.

H 1.4 There is no significant difference
between Asian and Caucasian Americans on
social shopping.

H 1.5 There is no significant difference
between Asian and Caucasian Americans on
brand loyal shopping.

H 1.6 There is no significant difference
between Asian and Caucasian Americans on
impulse shopping.

H 1.7 There is no significant difference
between Asian and Caucasian Americans on
fashion orientation.

Hypothesis 2. There is no correlation between apparel
shopping orientations and the intensity
of ethnic identification among Asian
Americans.

Research Design

The purpose of this study was to compare Asian
Americans' apparel shopping orientations with those of
Caucasian Americans. When analyzing the data, the

independent variable was ethnicity (Asian versus Caucasian). Dependent variables were the seven orientations: economic shopping, personalizing shopping, recreational shopping, social shopping, brand loyal shopping, impulse shopping and fashion orientation.

The nature of the study was observational in which no variables were manipulated. The data collection method involved a mailed questionnaire survey. To test the research hypotheses, the following data were collected: 1) ratings on seven shopping orientations and 2) Asian Americans' intensity of identification with their ethnicity. In order to describe the sample, demographic characteristics of the respondents were also collected.

Sample

A nonprobability, purposive sample was used in this study because of the following two reasons: 1) Owing to the nature of this study, Asian Americans must be purposively identified and 2) Because of the racial discrimination issue, race (or ethnicity) information is not a requirement for many forms of data. There is not a readily available way, such as DMV (Department of Motor Vehicles) data or telephone book listings to identify Asian Americans.

Under the approval of the Affirmative Action Office of Oregon State University (OSU), a computer generated random

sample was purchased from the Registrar's Office. This random sample consisted of 300 Asian American and 300 Caucasian American students' names and mailing addresses. This sample was drawn from the students enrolled at OSU for 1990 Fall Term.

In this study "Asian American" and "Caucasian American" were defined as those who were U.S. citizens or permanent residents (Resident Aliens) and those who identified themselves with either Asian or Caucasian ethnicity. Although the sample size was 600 in total, seventeen respondents were found to be ineligible (neither Asian nor Caucasian, or not U.S. citizens or permanent residents) and were excluded from the study.

The demographic profile of the Asian versus Caucasian student population at Oregon State University in 1990 is presented in Table 1.

Research Instrument

Data were collected by means of a mailed questionnaire survey. The questionnaire (Appendix B.) included questions measuring seven apparel shopping orientations, intensity of ethnic identification and questions on demographic characteristics. Only the Asian American respondents were asked to rate their intensity of ethnic identification.

The instrument used to measure the first six shopping

Table 1
Oregon State University
Asian American vs White American Student Population
(Fall, 1990)

Colleges	Asian			White			Others Sub- Total	Grand Total
	Grad	Under	Sub-T	Grad	Under	Sub-T		
Agriculture	3	12	15	122	549	671	366	1052
Business	8	133	141	64	1,884	1,948	519	2,608
Education	6	3	9	176	160	336	164	509
Engineering	12	263	275	137	1,675	1,812	778	2,865
Forestry	1	3	4	50	256	306	128	438
Graduate School	9	0	9	261	0	261	164	434
Health & HP	2	13	15	47	453	500	94	609
Home Economics	2	45	47	47	604	651	139	837
Liberal Arts	0	138	138	9	2,648	2,657	583	3,378
Oceanography	2	0	2	35	0	35	45	82
Pharmacy	2	89	91	6	326	332	91	514
Science	12	113	125	265	1,251	1,516	513	2,154
UESP	0	26	26	0	332	332	111	469
Veterinary Medicine	2	0	2	64	0	64	9	75
Grand Total (Male) (Female)	61	838	899 (521) (378)	1283	10138	11421	3,704	16,024

Source: Institutional Research and Planning,
Oregon State University (Fall, 1990)

orientations was adopted from Valencia's (1982) study. The original instrument was used by Valencia to study shopping orientations of Hispanics compared to those of whites. This instrument measures shopping orientations on 5-point Likert scales (see Appendix B, questions A.1 - A.27). Valencia's instrument evolved from the findings of several previous studies on shopping orientations, such as Bellenger and Korgaonkar (1980), Bellenger and Valencia (1982), Boone, Kurtz, Johnson and Bonno (1974), Darden and Ashton (1974-1975), Darden and Perreault (1976), Darden and Reynolds (1971), Gillett and Scott (1974), Howell (1979), Moschis (1976), Powell (1980). For the nature and purpose of the present study, some questions were modified to concentrate more on the shopping for apparel.

The internal reliability reported by Valencia (1982) were measured by Cronbach's coefficient alpha. For each orientation the reported coefficients were: economic shopping, 0.73; personalizing shopping, 0.78; recreational shopping, 0.87; social shopping 0.71; brand loyal shopping, 0.68 and impulse shopping, 0.71.

For the measurement of the seventh shopping orientation, fashion orientation, the instrument developed by Gutman and Mills (1982) was used (see Appendix B., questions B.1 - B.17). This instrument was based on Yang's (1979) conceptual life style framework, which employed seven dimensions of consumer's life style and a context-specific

approach to study behavior.

In Gutman and Mills' study, four factors were identified for fashion orientation: fashion leadership, fashion interest, fashion importance and antifashion attitude. Fashion orientation is measured on 5-point Likert scales. However, the reliability and validity of the instrument was not reported by the researchers.

In Hirschman's (1981) work on the intensity of ethnic identification and the more recent study by Valencia(1982), the intensity of ethnic identification was measured by a single-item. Hirschman combined ethnic identification with religious affiliation to measure Jewish ethnicity multidimensionally. In Valencia's study (1982), ethnic identification was considered as part of an index of acculturation (Deshpande, Hoyer and Donthu, 1986).

In the present study, intensity of ethnic identification was measured as a distinct construct apart from religious or other socio-cultural correlates, as suggested by Deshpande et al. (1986). The measurement of the intensity of ethnic identification was operationalized with two questions, which were used in Hutnik's (1986) research to study patterns of ethnic minority identification and modes of social adaptation. First, subjects were asked to choose one ethnic group that they identified with and then only those who identified themselves with Asian Americans were asked to answer two questions measuring the

intensity of identification on 5-point Likert scales (Appendix B, questions C.1a and C1.b). However, the reliability and validity of this measure were not reported by Hutnik (1986).

Cronbach's coefficient alpha was used to estimate the reliability of the instrument in this study. It was reported by Peter (1979) that Cronbach's coefficient alpha was the most commonly accepted formula for assessing the reliability of a measurement scale with multi-point items. It was also referred to as a most useful formula for assessing the reliability of measures in marketing research (Peter, 1979).

Face validity is the assessment of the extent to which the instrument appears to measure the subject matter under consideration. Factor analysis was conducted to check factor loadings on each item. Content validity is the representativeness or sampling adequacy of the content of a measuring instrument. The estimates of reliability and factor loadings of the scales used in this study were compared to the estimates reported in Valencia's (1982) study and are reported in the next chapter.

Demographic information was collected on the subjects' age, sex, academic major, class standing (freshman - graduate), birth place, citizenship, how long they have resided in the U. S., the occupation of the head of the household, household size and number of wage earner(s) in

the family.

The research instrument was reviewed by several faculty members in the Apparel, Interiors, Housing and Merchandising Department, one faculty member in the department of Business Administration and a consultant at the university Survey Research Center for content validity, questionnaire construction and editorial format.

Thirteen potential subjects pretested the questionnaire before data collection. Seven of them were Caucasian American and six were Asian American students on the OSU campus. The pretest was conducted in the presence of the researcher in order to get verbal and nonverbal feedback on potential problems. Dillman (1978) valued a pretest technique with the presence of the researcher because of two crucial aspects. One is immediate verbal feedback, which might not be provided without the presence of the researcher. The other is the observations made while the respondent fills out the questionnaire. The nonverbal feedback, which might not be expressed consciously by respondents, proves most valuable.

Based on the feedback from the pretest, several modifications were made to the instrument. First, the wording was modified to be as simple and concise as possible in consideration of the English proficiency of some of the Asian American subjects. Second, two questions about apparel shopping with family members, but not friends, were

added to the questionnaire for measuring social shopping orientation. Since some pretest respondents stated they liked to go shopping with their family members instead of friends, and this should be included as one dimension of the social shopping orientation (in addition to shopping with friends) according to the definition of social shopping used in Valencia's study.

Data Collection

Dillman's (1978) "Total Design Method (TDM)" was used as a guideline for assuring a reasonably good response rate and higher probability of complete response to the questionnaire. The construction, order and grouping of the questions, length of the questionnaire, and the implementation process also followed Dillman's guidelines.

The initial mailing of 600 was sent to the 300 Asian American and 300 Caucasian American students on the random sample list. This initial mailing included a cover letter introducing the research purpose as well as the importance of the study (Appendix A). Also, it included a questionnaire and a self-addressed, postage-paid business-reply envelope. The questionnaires were numbered sequentially in the upper right hand corner. The numbers were used as identification numbers of respondents to facilitate the follow-up procedures.

The follow-up sequence included two mailings, not three mailings as recommended by Dillman (1978), because of the time constraint of a shorter 1990 Fall Term at OSU. A postcard was sent to everyone one week after the first mailout as a thank you note or a reminder (Appendix A). Two weeks after, a second cover letter (Appendix A), reply envelope and replacement questionnaire were sent to nonrespondents. One week after the second follow-up, a 76% return rate was generated and by this time, final examinations were about to begin. Therefore, the third follow-up was considered neither helpful nor necessary by the researcher and was not implemented.

Data Analyses

The major data analysis techniques for testing the hypotheses were multivariate analysis of variance (MANOVA), t-test and Pearson correlation. For hypothesis 1, more than one dependent variable (seven shopping orientations) were analyzed simultaneously to test the null hypothesis. The overall shopping orientations construct for each ethnic group was tested for differences in multivariate group means by MANOVA. For each sub-hypothesis, mean differences by ethnic group were tested for each of the seven shopping orientations by t-test.

However, before testing the hypotheses by MANOVA or t-

test, two assumptions, homogeneity of dispersion and normality were checked by a histogram and goodness of fit test. It was found that on some of the orientations the distributions were not normal. Therefore, the non-parametric Mann-Whitney Test was also used as a backup to check the findings that resulted from the t-tests. These two tests reached the same findings and they are both reported in the next chapter.

Since both intensity of ethnic identification and shopping orientations are continuous data, the two variables were analyzed for their correlation to test hypothesis 2. The nominal (categorical) data derived from the demographic characteristics section were analyzed by descriptive statistics. Descriptive statistics including central tendency, frequency and variability (dispersion) were used to describe the two sample populations.

Summary

The research questions under investigation were: what is the pattern of apparel shopping orientations of Asian American in comparison with Caucasian American students at Oregon State University? Is there any correlation between apparel shopping orientations and intensity of ethnic identification among Asian American students at OSU? The consumer behavior model proposed by Engel, Kollat and

Blackwell (1973) served as the theoretical framework for this study. Seven apparel shopping orientations were investigated: economic shopping, personalizing shopping, recreational shopping, social shopping, brand loyal shopping, impulse shopping and fashion orientation. A purposive sample of 300 Asian American and 300 Caucasian American students was drawn from the students enrolled at OSU for 1990 Fall Term. The data collection method involved a mailed questionnaire survey. Dillman's (1978) Total Design Method served as a guideline when implementing data collection procedures. MANOVA, t-test and correlation were used to test the two research hypotheses.

CHAPTER IV

FINDINGS AND DISCUSSION

In this chapter, questionnaire response rate and demographic characteristics of the respondents are presented. Also estimates of reliability and factor loadings of the scales are reported. Finally, the results of MANOVA, t-tests and Pearson correlation analyses used to test the hypotheses are discussed.

Questionnaire Response Rate

The data collection method utilized in this study was a mailed questionnaire survey. A total of 600 questionnaires were mailed to 300 Asian American and 300 Caucasian American students. Forty of the questionnaires were returned as non-deliverable. Among the 560 deliverable questionnaires, 425 were returned after two follow-up mailings. Among them, 199 were from the Asian group and 226 from the Caucasian group. Seventeen out of the 425 returned questionnaires were found ineligible for use in this study since the respondents did not identify themselves as either Asian or Caucasian, or they were not Americans (neither an American citizen nor permanent resident). As a result, data from 408 questionnaires were used for analysis in this

study. Another seven respondents did not answer the key question on their ethnicity and were only analyzed by their demographic characteristics, but not included for hypotheses tests.

In order to provide a more direct indicator of the response-inducing capabilities of the data collection method being implemented in this study, the calculation of the response rates followed the formula recommended by Dillman (1978). The formula of this calculation divides the number of questionnaires returned by the total number in sample minus nondeliverables; the result is then multiplied by 100. This resulted in return rates of 75.9% for the total sample, with 72.6% for the Asian group and 79.0% for the Caucasian group respectively (Table 2).

Demographic Characteristics of the Respondents

The demographic characteristics of the respondents are presented in Tables 3, 4, 6 (categorical data) and Table 5 (continuous data). Among the 401 respondents, 182 identified themselves as Asian Americans and 219 were Caucasian Americans, constituting 45.4% and 54.6% of the sample respectively. Over half of the respondents were male (51.4%) and the remainder (48.6%) were female. The majority of the respondents were undergraduate students and 5.9% (24) were graduate students (Table 3).

Table 2
Questionnaire Response Rate

Item	Number	Percentage
<u>Total Number of Questionnaires Mailed</u>	600	
Asian American	300	
Caucasian American	300	
<u>Total Number Returned</u>	425	
Asian American	199	
Caucasian American	226	
<u>Nondeliverables</u>	40	
Asian American	26	
Caucasian American	14	
<u>Total Response Rate^a</u>	425	75.9%
Asian American	199	72.6%
Caucasian American	226	79.0%

$$^a \text{ Response rate} = \frac{\text{Total Number Returned}}{\text{Sample Number} - \text{Nondeliverable}} (100)$$

Table 3
Demographic Characteristics of the Respondents
(Categorical Data)

Characteristic	Asian		Caucasian	
	Number	Percentage ^a	Number	Percentage ^a
<u>Ethnicity</u>	182	100%	219	100%
<u>Sex</u>				
Male	104	57.1%	103	47.0%
Female	78	42.9%	116	53.0%
Total	182	100%	219	100%
<u>Class Standing</u>				
Freshman	45	24.7%	37	16.9%
Sophomore	45	24.7%	41	18.7%
Junior	34	18.7%	49	22.4%
Senior	48	26.4%	70	32.0%
Graduate	7	3.8%	17	7.8%
Other(special, post-bac)	3	1.6%	5	2.3%
Total	182	100%	219	100%
<u>College</u>				
Agriculture	4	2.2%	11	5.1%
Business	28	15.6%	42	19.4%
Education	1	0.6%	9	4.2%
Engineering	70	38.9%	34	15.7%
Forestry	1	0.6%	6	2.8%
Health & Human Perf	4	2.2%	5	2.3%
Home Economics	7	3.9%	19	8.8%
Liberal Arts	21	11.7%	53	24.5%
Oceanography	0	0.0%	0	0.0%
Pharmacy	12	6.7%	5	2.3%
Science	31	17.2%	31	14.4%
Vet. Medicine	0	0.0%	0	0.0%
Interdis. Prog.	1	0.6%	1	0.5%
Total	180	100%	216	100%

^a The percentages were based on number of responses to each question (does not include missing data).

As to college distribution, 104 of the respondents were in the College of Engineering, constituting 25.8% of the sample. Compared to the student population on campus, only 17.9% of the students are in the College of Engineering. However, in the present study, 38.9% of the Asian American students were enrolled in engineering. The statistics indicated that the high percentage of Engineering majors in this sample came from the high density (30.59%) of Asian American engineering majors at OSU.

There were 106 respondents who were not born in the United States. Among them, six were Caucasian Americans and 100 were Asian Americans. The summary statistics demonstrated that among Asian Americans who were not born in the U.S., almost half of them were born in Korea (22%) or Vietnam (27%) (see Table 4).

The summary statistics also revealed that most (42%) of the Caucasian Americans reported that their great grandparents were the first generation to come to the U. S. (Table 4). Among the Asian group, most (46.7%) stated that their parents were the first generation to come to U.S. A Chi-Square test indicated a significant difference between the Asian and Caucasian American respondents' generation of family first to come to the U.S (p-value = 0.00). Obviously, the Asian American respondents were of a younger generation in the U.S. than were the Caucasian Americans. This also explained why the statistics showed significant

Table 4
Demographic Characteristics of the Respondents
(Categorical Data)

Characteristic	Asian		Caucasian	
	Number	Percentage ^a	Number	Percentage ^a
<u>Country of Birth^b</u>				
China	5	5.0%		
Taiwan	7	7.0%		
Korea	22	22.0%		
Vietnam	27	27.0%		
Cambodia	8	8.0%		
Hong Kong	7	7.0%		
Philippines	4	4.0%		
India	4	4.0%		
Iran	1	1.0%	1	16.7%
Bangladesh	1	1.0%		
Canada	2	2.0%		
Laos	1	1.0%		
Khmer	1	1.0%		
N. Mariana Isl.	2	2.0%		
Burma	1	1.0%		
Thailand	3	3.0%	1	16.7%
Nepal	1	1.0%		
Brunei	1	1.0%		
Sri Lanka	1	1.0%		
England	1	1.0%	1	16.7%
Others	0	0.0%	3	50.0%
Total	100	100.0%	6	100.0%
<u>Generation First to Come to U.S.</u>				
G. Grand Parents	29	15.9%	92	42.0%
Grand Parents	18	9.9%	22	10.0%
Parents	85	46.7%	8	3.7%
Self	33	18.1%		
Do Not Know	9	4.9%	70	32.0%
Others	8	4.4%	27	12.3%
Total	182	100.0%	219	100.0%
<u>Citizenship</u>				
U.S. Citizen	149	81.9%	219	100.0%
Perma. Resident	33	18.1%	0	0.0%
(Resident Alien)	182	100.0%	219	100.0%

^a The percentages were based on number of responses to each question (does not include missing data).

^b Only those respondents who were not born in the U.S. were requested to answer this question.

difference between Asian and Caucasian respondents' years of residing in the U.S. ($p\text{-value} = 0.000$) with the mean years of 14.5 for the Asian and 22.7 for the Caucasian respondents.

The mean age of the respondents was 22.2 years with the range from 17-67 years. However, the $t\text{-test}$ showed that the Asian respondents were significantly younger than the Caucasian respondents ($p\text{-value} = 0.000$), with the mean age of 21.0 for the Asian and 23.20 for the Caucasian group respectively (Table 5).

In regard to marital status, the high percentage (87.9%) of those indicating single obviously reflected a common characteristic of the sample population (university students). A Chi-Square test demonstrated significant difference ($p\text{-value} < 0.00$) between Asian and Caucasian respondents' marital status with more Caucasian respondents married (15.2% for the Caucasian and 3.8% for the Asian group). Meanwhile, 96.2% of the Asian American students were single in comparison with 81.6% for the Caucasians (Table 6).

The statistics revealed that the Asian respondents were from significantly larger households (number of persons per household) with more wage earners per household than were the Caucasians. This finding agreed with what reported by Zinsmeister (1988) that Asians averaged more workers per family. Also a Chi-Square test demonstrated there was a

Table 5
Demographic Characteristics of the Respondents
(Continuous Data)

Characteristic	N	Range	Mean	SD
<u>Age</u>		17-67		
Asian	182		20.9	3.0
Caucasian	<u>219</u>		23.2	7.5
Total	410			
<u>Years of Stay in the U.S.</u>		1-67		
Asian	181		14.5	6.3
Caucasian	<u>218</u>		22.7	7.4
Total	399			

Table 6
Demographic Characteristics of the Respondents
(Categorical Data)

Characteristic	Asian		Caucasian	
	Number	Percentage ^a	Number	Percentage ^a
<u>Marital Status</u>				
Single	175	96.2%	177	81.6%
Married	7	3.8%	33	15.2%
Separated	0	0.0%	2	9.0%
Divorced	0	0.0%	4	1.8%
Widowed	0	0.0%	1	5.0%
Total	182	100.0%	217	100.0%
<u>Size of Household (# of Persons)</u>				
2	4	2.2%	4	1.8%
3	14	7.7%	22	10.1%
4	47	25.8%	81	37.2%
5	39	21.4%	66	30.3%
6	33	18.1%	20	9.2%
7	20	11.0%	12	5.5%
8	8	4.4%	7	3.2%
9	5	2.7%	2	0.9%
10	6	3.3%	2	0.9%
11	0	0.0%	2	0.9%
12	4	2.2%	0	0.0%
13	1	0.5%	0	0.0%
15	1	0.5%	0	0.0%
Total	182	100.0%	218	100.0%
<u>Occupation of The Head of Household</u>				
Professional	40	22.7%	54	25.0%
Technical	30	17.0%	40	18.5%
Manag./Superv.	24	13.6%	35	16.2%
Self-employed	27	15.3%	16	7.4%
Clerical	11	6.3%	30	13.9%
Skilled	12	6.8%	10	4.6%
Semi-skilled	13	7.4%	20	9.3%
Unskilled	13	7.4%	11	5.1%
Unemployed	6	3.4%	0	0.0%
Total	176	100.0%	216	100.0%
<u>Number of Wage Earners</u>				
0	2	1.1%	0	0.0%
1	52	29.5%	87	39.7%
2	108	61.4%	127	58.0%
3	8	4.5%	3	1.4%
4	1	0.6%	2	0.9%
5	5	2.8%	0	0.0%
Total	176	100.0%	219	100.0%

^a The percentages were based on number of responses to each question (does not include missing data)

significant difference between the occupations of the heads of households of these two groups ($p\text{-value} = 0.007$). More Caucasian household heads (25.0%) were reported to be in the professional category, compared to 22.7% for the Asians. More of the Asian heads of household (15.3%) were self-employed compared to the Caucasians (7.4%).

Reliability and Validity of the Scales

Scales that were developed and tested by Valencia (1982) were used in this study to measure the first six shopping orientations. The seventh fashion orientation was measured by the scales developed by Gutman and Mills (1982). Two scales adapted from Hutnik's (1986) study were utilized to measure the intensity of ethnic identification of the Asian American respondents.

The alpha coefficients calculated from the data to estimate the reliabilities of the scales are reported and compared to those reported in Valencia's (1982) study in Table 7. For the first six apparel shopping orientations, the reliability coefficient estimates compared favorably to those reported by Valencia (1982), with all of them higher than 0.50 except the economic shopping orientation (0.39). This orientation was measured by question items A.6, A.10, A.12 and A.18 (Appendix B.). These measured how subjects evaluated stores and apparel items in terms of price,

Table 7
Estimates of Reliability of the Scales

Scale	Coefficient Alpha
<u>Apparel Shopping Orientation</u>	
Economic Shopping	0.39 (0.73) ^a
Personalizing Shopping	0.64 (0.55) ^a
Recreational Shopping	0.89 (0.87) ^a
Social Shopping	0.70 (0.71) ^a
Friend Social Shopping	0.75
Family Social Shopping	0.74
Brand Loyal Shopping	0.69 (0.68) ^a
Impulse Shopping	0.80 (0.71) ^a
Fashion Orientation	
Fashion Leadership	0.76
Fashion Interest	0.77
Fashion Importance	0.80
Antifashion attitude	0.48
<u>Intensity of Ethnic Identification</u>	0.47 ^b

^a Coefficient alpha reported by Valencia (1982).

^b The scale reliability was measured by Pearson correlation coefficient, instead of Cronbach's alpha.

quality, value and merchandise assortments. This low reliability might be attributed to the confusion created by the categorization of the stores, such as "small stores", "big chains" and "department stores". It has been almost ten years since Valencia conducted his study. Owing to the changing retailing environment, people may define or perceive these categories of stores differently than they did ten years ago. Also, the wording of the questions such as "better bargains" or "more reasonable prices" may be interpreted differently by individuals. Respondents in the present study may have understood and/or interpreted them differently than the Hispanic/white respondents in Valencia's study.

All four factors of the fashion orientation measure had alpha coefficients higher than 0.75, except the last one, antifashion attitude (0.48). For the two items (Appendix B. questions C.1a and C.1b) measuring intensity of ethnic identification, Pearson correlation coefficients were calculated to measure the correlation of these two questions. Since there were only two items measuring this construct, it would be meaningless to calculate coefficient alpha for two items only. The resulting coefficient was 0.47 with $p\text{-value} = 0.000$, which indicated that the reliability of this scale was acceptable.

Moreover, the one-way ANOVA analysis of intensity of ethnic identification by generation (Appendix B, question

D.7) demonstrated that there was a significant difference in intensity of identification among Asian Americans by their generation in the U.S. (p -value = 0.000, F = 8.13). The finding implied that the younger an Asian respondent's generation was, the more he (she) identified with Asian ethnicity. This finding implied that the Asian respondents' intensity of ethnic identification could be reflected from his (her) generation in the U.S.

In order to compare with the factor loadings reported by Valencia (1982), Image factor analysis with varimax rotation was also conducted to analyze the 46 scale items measuring shopping orientations and the intensity of ethnic identification. The factor loadings of the scale items are presented and compared to those reported by Valencia (1982) in Table 8. Almost all of the items compared favorably to those reported by Valencia, except two items (A.10 and A.12) measuring economic orientation and three items (A.2., A.13 and A.17) measuring friend social orientation.

Since the respondents may have been confused due to the classification of the stores, the store names being listed or the wording of the questions, A.10 and A.12 with lower loadings may not have measured the orientation they were supposed to measure. Questions A.2 and A.17, with low loadings on friend social orientation, had higher loadings on recreational shopping. Question A.13 had higher loading on personalizing shopping. Respondents in the present study

Table 8
Factor Loadings of Shopping Orientations

Scale	Question Item #	Factor Loading
<u>Shopping Orientation</u>		
Economic	A. 6 (R)	0.57 (0.64) ^a
	A. 10	0.23 (0.52) ^a
	A. 12	0.01 (0.35) ^a
	A. 18	0.57 (0.64) ^a
Personalizing	A. 3	0.45 (0.70) ^a
	A. 9	0.51 (0.63) ^a
	A. 19 (R)	0.39 (0.49) ^a
	A. 24 (R)	0.35 (0.71) ^a
Recreational	A. 1	0.79 (0.78) ^a
	A. 8 (R)	0.73 (0.76) ^a
	A. 14 (R)	0.60 (0.59) ^a
	A. 20 (R)	0.62 (0.70) ^a
	A. 21	0.55 (0.63) ^a
	A. 25 (R)	0.61 (0.56) ^a
Friend Social	A. 2	0.14 (0.55) ^a
	A. 13	0.07 (0.36) ^a
	A. 17	0.20 (0.55) ^a
Family Social	A. 23 (R)	0.53
	A. 27	0.55
Brand Loyal	A. 4	0.57 (0.53) ^a
	A. 7	0.54 (0.51) ^a
	A. 16	0.48 (0.44) ^a
	A. 22 (R)	0.39 (0.41) ^a
Impulse	A. 5 (R)	0.44 (0.43) ^a
	A. 11	0.64 (0.58) ^a
	A. 15	0.64 (0.59) ^a
	A. 26 (R)	0.55 (0.45) ^a

^a Factor loadings reported by Valencia (1982)

Note: (R) = Items that were reverse scored.

may have interpreted the term "people" in the item stating shopping as "the chance to talk to people" as store sales associates, but not friends with whom they shopped. The respondents in present study obviously interpreted those questions differently than the respondents in Valencia's (1982) study.

Given these inconsistent reliability estimates (economic orientation) and factor loadings (A.10, 12, A.2, 13, 17) from that reported by Valencia (1982), these scales were neither changed from their original shopping orientation grouping nor were they eliminated when analyzing the data. The data were analyzed as they were proposed so that the results could be compared to Valencia's (1982) findings.

For another social shopping dimension, family social shopping, which was added to the instrument (question A.23 and A.27) by the researcher, the reliability estimate (coefficient alpha = 0.74) and factor loadings (0.53 and 0.55) were both acceptable (Table 8). This provided evidence that an additional dimension of social shopping (besides shopping with friends) merited exploration. Also the results of factor analysis suggest that it may be worthwhile to test the reliability and validity of this dimension in the future.

All of the scales measuring the four factors of fashion orientation had loadings higher than 0.30 on fashion

Table 9
Factor Loadings of Fashion Orientation

Scale	Question Item #	Factor Loading
<u>Fashion Orientation</u>		
Fashion Leadership	B. 1	0.59
	B. 2 (R)	0.45
	B. 3	0.43
	B. 4	0.38
	B. 5	0.66
Fashion Interest	B. 6	0.21
	B. 7	0.14
	B. 8 (R)	0.25
	B. 9	0.11
	B. 10 (R)	0.17
Fashion Importance	B. 11	0.58
	B. 12	0.62
	B. 13	0.53
	B. 14	0.48
Antifashion Attitude	B. 15	0.36
	B. 16	0.34
	B. 17	0.30

Note: (R) = Items that were reverse scored.

leadership, fashion importance and antifashion attitude, except fashion interest (Table 9). Fashion interest was measured by five questions, B.6 through B.10 (see Appendix B). The low loadings on these scales suggested further revision and improvement are needed when replicating this study or when this instrument is being used. When analyzing the data, the fashion interest factor was included but no significant difference was found on this particular fashion orientation factor.

Descriptive Analysis of Variables

Before the testing of hypotheses, a descriptive analysis of all shopping orientation variables is presented. This analysis included the total sample population (maximum case number was 408). The purpose of this analysis was to present a overall picture of how the sample population (including both Asian and Caucasian students) responded on those orientations and then the differences between these two sample groups are presented in the following section.

Means and standard deviations of respondents' responses to the dependent variables (apparel shopping orientations and intensity of ethnic identification) are presented in Table 10. Responses to all the scales ranged from one to five, from strongly disagree to strongly agree. For the first six shopping orientations, the means are all below

Table 10
Descriptive Statistics of Variables

Variable	N	Mean	SD
<u>Shopping Orientations</u>			
Economic Shopping	408	3.05	0.62
Personalizing Shopping	408	2.35	0.71
Recreational Shopping	404	3.48	0.98
Social Shopping	404	2.84	0.80
Friend Social Shopping	408	2.71	0.96
Family Social Shopping	408	1.18	0.46
Brand Loyal Shopping	408	2.78	0.79
Impulse Shopping	404	3.02	0.96
Fashion Orientation			
Fashion Leadership	404	2.61	0.79
Fashion Interest	407	2.81	0.92
Fashion Importance	406	3.59	0.66
Antifashion Attitude	407	3.75	0.72
<u>Intensity of Ethnic Identification^a</u>	107	2.92	1.29

^a Only Asian American respondents were asked to respond on this scale.

3.48, with family social shopping the lowest, (mean = 1.18) and recreational shopping highest (mean = 3.48). Generally speaking, respondents in this study viewed shopping for clothes as a recreational activity (mean = 3.48) more than as a necessity (economic shopping) (mean = 3.05). The entire sample did not view apparel shopping as a social activity (mean = 2.84), specifically they did not like shopping for clothes with family members (mean = 1.18).

The highest mean on fashion orientation was antifashion attitude, 3.75 with standard deviation of 0.72 and the lowest mean was fashion leadership, 2.61 with standard deviation of 0.79. The highest mean on antifashion attitude meant the entire sample did not like to be told what to wear by fashion experts and they tended to buy clothes they liked regardless of current fashion. Interestingly, although they were antifashion (mean = 3.75) more than the average (mean = 3.0), they regarded being well-dressed as very important (mean = 3.59).

Altogether 107 Asian American respondents responded to the ethnic identification questions. The mean was 2.92, which implied that in general, these Asian American students did not strongly identify their ethnicity as either Asian or American.

Results of Hypotheses Testing

In this section, results of the test of two hypotheses are presented. Hypothesis 1. was tested by MANOVA and then each sub-hypothesis from H 1.1 to H 1.7 was tested by t-test. Furthermore, the non-parametric Mann-Whitney test was conducted to check each sub-hypothesis, since not every distribution met the assumption of normality for MANOVA and t-test. The relationship between the continuous variables of shopping orientations and the intensity of ethnic identification was tested by Pearson correlation.

MANOVA Test Results for Shopping Orientations by Ethnicity

The first null hypothesis stating that there are no significant differences in apparel shopping orientations between Asian and Caucasian Americans was tested by Wilk's MANOVA. Prior to hypothesis testing, the homogeneity of dispersion and normality of distribution were checked. MANOVA assumes homogeneity of dispersion matrices and multivariate normality of distribution. The dispersion matrices refer to the error sources from which the SSCP error is pooled (Barker & Barker, 1983). T-test also assumes equal variances and normality.

A multivariate test for homogeneity of dispersion matrices demonstrated that the first assumption was met. The histogram and Kolmogorov-Smirnov goodness of fit test demonstrated that some of the distributions were not normal.

Therefore, a non-parametric test, the Mann-Whitney test was used as a back-up test to check each sub-hypothesis in addition to the t-test.

However, it was indicated by Barker and Barker (1983) that there appeared to be no compelling reason to be overly concerned about the assumption of normality of multivariate distribution. Analyses showed that non-normality was found to exert little effect on any of the four MANOVA tests (Wilk's lambda, Hotelling, Roy and Pillai). Besides, the non-parametric test cannot test the general Hypothesis 1 by taking all the dependent variables into account at once. MANOVA was still the most appropriate test for testing the general Hypothesis 1.

The results of the MANOVA test are presented in Table 11. The p-value was 0.003, which suggested that null Hypothesis 1. was rejected at the significance level of $p \leq 0.05$. Results indicated that significant differences were found between Asian and Caucasian American students on their overall apparel shopping orientations. Therefore, subsequent t-tests were conducted on each sub-hypothesis to find out how they were different and on which orientation they were different.

T-test Results of Each Sub-hypothesis under Hypothesis 1

Since the previous MANOVA test demonstrated that the null Hypothesis 1. was rejected, t-tests were conducted for each orientation to find out which of these orientations

Table 11
MANOVA Test Results for Shopping Orientations
By Ethnicity
(N=401)

Test Name	Value	Approx. F	Hypoth. DF	p-value
Wilks Lambda	0.93	2.65	11.00	0.003

contributes to the overall significant differences on apparel shopping orientations between Asian and Caucasian American students. The results are presented in Table 12.

The results suggested that the null sub-hypotheses 1.4, 1.5 and 1.7 be rejected at the significance level of 0.05. In other words, significant differences were found between Asian and Caucasian Americans on social shopping, both friend and family social shopping, brand loyal shopping and fashion leadership orientations.

Social shopping orientation measures the degree to which respondents view apparel shopping as a social activity. The Asians had a significantly higher group mean (2.94) than did the Caucasian group (2.75), which suggested that the Asian respondents in this study were more socially oriented than the Caucasians when shopping for clothes.

The social shopping orientation was further broken down into two dimensions: shop with friends or shop with family members. T-tests indicated that the Asians and Caucasians were significantly different on both dimensions. Again, the Asians scored higher on both friend social shopping ($M = 2.82$) and family social shopping ($M = 2.62$) than did the Caucasian ($M = 1.23$, $M = 1.13$). Results indicated that the Asians were more socially oriented than the Caucasians in terms of apparel shopping. The Asians in the present study liked to shop for clothes with either friends or family members more than did the Caucasians.

Table 12
Results of T-test for Each Orientation
by Ethnicity

Dependent Variable	N	Group Mean	SD	t-value	P-values
<u>Economic Shopping</u>				0.71	0.478
Asian	182	3.07	0.61		
Caucasian	219	3.02	0.62		
<u>Personalizing Shopping</u>				-0.40	0.690
Asian	182	2.34	0.69		
Caucasian	219	2.37	0.73		
<u>Recreational Shopping</u>				0.37	0.712
Asian	181	3.49	0.98		
Caucasian	216	3.46	1.00		
<u>Social Shopping</u>				2.50	0.013
Asian	181	2.94	0.77		
Caucasian	216	2.75	0.81		
<u>Friend Social Shopping</u>				2.14	0.033
Asian	181	2.82	0.90		
Caucasian	219	2.62	0.10		
<u>Family Social Shopping</u>				2.16	0.032
Asian	182	1.23	0.44		
Caucasian	219	1.13	0.48		
<u>Brand Loyal Shopping</u>				2.15	0.012
Asian	182	2.90	0.78		
Caucasian	219	2.70	0.78		
<u>Impulse Shopping</u>				0.81	0.420
Asian	181	3.06	0.92		
Caucasian	216	2.99	0.99		
<u>Fashion Leadership</u>				2.29	0.023
Asian	181	2.71	0.78		
Caucasian	216	2.53	0.80		
<u>Fashion Interest</u>				0.68	0.499
Asian	182	2.85	0.87		
Caucasian	219	2.78	0.96		
<u>Fashion Importance</u>				-0.91	0.363
Asian	181	3.56	0.71		
Caucasian	219	3.62	0.62		
<u>Anti-fashion Attitude</u>				-0.14	0.892
Asian	182	3.74	0.71		
Caucasian	219	3.75	0.73		

Brand loyal shoppers tend to have biased choice behavior toward particular brands of merchandise (apparel) while shopping. The higher mean of the Asian group compared to that of Caucasian's (2.90 vs 2.70) indicated that the Asian Americans in this study were significantly more brand loyal than the Caucasian American students.

Fashion orientation was specifically chosen for investigation in this apparel shopping study. As one of the factors of fashion orientation, fashion leadership measures how strong the respondent likes to be regarded or regards himself (herself) as a fashion leader. T-test with a p-value of 0.023 suggested there was a significant difference between Asian and Caucasian respondents on this factor. The group means were 2.71 and 2.53 for the Asian and the Caucasian groups respectively, which indicated that the Asians liked to be and perceived themselves to be fashion leaders more than the Caucasians.

Since the assumption of normality for t-tests and MANOVA were not met by some distributions of the orientations, the non-parametric Mann-Whitney Test, was also conducted to double check the results of the t-tests. The results of the Mann-Whitney tests were consistent with those of the t-tests. The results are presented in Table 13.

Correlation Test of Hypothesis 2

Hypothesis 2 stated that there was no correlation between apparel shopping orientations and the intensity of

Table 13
Mann-Whitney Test of Each Orientation
by Ethnicity

Dependent Variable	Mean Rank	P-value
<u>Economic Shopping</u>		0.51
Asian	205.17	
Caucasian	197.54	
<u>Personalizing Shopping</u>		0.92
Asian	200.39	
Caucasian	201.51	
<u>Recreational Shopping</u>		0.69
Asian	201.47	
Caucasian	196.93	
<u>Social Shopping</u>		0.02
Asian	214.22	
Caucasian	186.25	
<u>Friend Social Shopping</u>		0.03
Asian	214.71	
Caucasian	189.60	
<u>Family Social Shopping</u>		0.03
Asian	214.98	
Caucasian	189.38	
<u>Brand Loyal Shopping</u>		0.01
Asian	217.40	
Caucasian	187.37	
<u>Impulse Shopping</u>		0.44
Asian	203.86	
Caucasian	194.93	
<u>Fashion Leadership</u>		0.01
Asian	214.45	
Caucasian	186.05	
<u>Fashion Interest</u>		0.31
Asian	207.48	
Caucasian	195.62	
<u>Fashion Importance</u>		0.61
Asian	197.25	
Caucasian	203.18	
<u>Anti-fashion Attitude</u>		0.73
Asian	198.84	
Caucasian	202.79	

ethnic identification among Asian Americans. Since both intensity of ethnic identification and shopping orientations were continuous data, Pearson correlation analysis was utilized to test hypothesis 2. The results are presented in Table 14.

For most of the orientations, the results suggested there was no correlation between shopping orientations and the intensity of ethnic of identification, except fashion importance. The results suggested a significant negative correlation was found (coefficient = -0.28; p-value = 0.00) between fashion importance and the intensity of ethnic orientation among Asian American respondents. The findings indicated that the more an Asian respondent identified with Asian ethnicity, the less he (she) thought being well-dressed was important. Or vice versa, the more an Asian respondent identified himself (herself) as American, the more he (she) regarded being well-dressed to be important.

When discussing any difference(s) between the Asian and Caucasian Americans, it should be noted that any difference found in this study should be interpreted as "group differences". These differences may be due to a number of factors (such as ethnicity, age, marital status or socio-economical level) or the interaction of several variables. They were not necessarily attributable to ethnicity only. In other words, the source of variation in the shopping orientations' distributions may be explained by some other

Table 14
Correlation Analysis of Shopping Orientations
by Intensity of Ethnic Identification
(N=179)

Orientation	Correlation Coefficient	P-value
Economic shopping	-0.08	0.14
Personalizing Shopping	-0.06	0.21
Recreational Shopping	-0.03	0.36
Social Shopping	-0.27	0.36
Friend Social Shopping	-0.27	0.36
Family Social Shopping	-0.01	0.45
Brand Loyal Shopping	-0.01	0.47
Impulse Shopping	0.04	0.29
Fashion Leadership	0.03	0.35
Fashion Interest	-0.03	0.35
Fashion Importance	-0.28	0.00
Fashion Attitude	0.00	0.49

factors which were not investigated in this study. From a practical point of view, however, these group differences may be still of interest to apparel marketers, retailers and other parties who are not concerned with the root cause(s) of these differences.

Additional Analyses

The initial descriptive statistics showed that the Asian and Caucasian respondents were different on some of their demographic characteristics other than ethnicity: age, marital status, academic major, social-economic status (including size of household, occupation of the head of household and number of wage earners in the household).

However, Valencia (1982) concluded that differences in shopping orientations can be attributed to ethnicity rather than social-economic variables. Kim (1987) also demonstrated no overall significant shopping orientation differences between Korean immigrants and whites across income and age categories. Scrank (1973) also studied fashion innovativeness and opinion leadership in relation to socio-economic variables. She concluded that fashion opinion leadership was not related to socio-economic level. In another study on fashion innovativeness and opinion leadership, Kim and Schrank (1982) studied Korean college women and found that fashion leadership among Korean college

women was not significantly related to social-economic level.

It was noted that most of the previous studies on shopping orientations have been conducted only with female respondents (Stone, 1954; Darden & Reynolds, 1971), few of them studied the difference between males and females in regard to their shopping orientations. Kim's research results showed that there were overall significant shopping orientation differences between Korean immigrants and whites across sex. They differed in an overall sense and on the following shopping orientations: brand loyalty proneness, shopping interest, coupon proneness, advertised shopper, shopping sex-roles and shopping center enthusiast.

With respect to fashion related studies, Goldsmith, Stith and White (1987) noted that no studies seem to have examined fashion interest or fashion innovativeness for both sexes simultaneously. Their study results suggested that sex, as one of many variables, was a better predictor than race (not ethnicity) and should be taken into consideration when conducting fashion-related studies.

Based on the results of previous research, Asian and Caucasian Americans in the present study were not studied by their socio-economic level. However, the researcher of the present study singled out "sex" from these demographic characteristics and investigated its effects on each shopping orientation and the interaction between ethnicity

and sex variables. First, one-way ANOVA was conducted to analyze shopping orientations by sex and the results are presented in Tables 15 and 16.

The statistical results suggested that, at the significance level of 0.05, male and female respondents are significantly different on the following shopping orientations: recreational shopping, social shopping, friend social shopping, family social shopping, brand loyal shopping, impulse shopping, fashion leadership, fashion interest and anti-fashion attitude. It was found that the female respondents enjoyed apparel shopping ($M = 3.86$) as a recreational activity more than the males ($M = 3.12$). Female shoppers were also more socially oriented ($M = 3.07$) than males ($M = 2.62$) when shopping for clothes. The female shoppers shop for clothes with either friends or family members more than the male shoppers. Female respondents were significantly more likely to be impulse shoppers ($M = 3.35$) than male respondents ($M = 2.70$), which meant female clothing shoppers had a greater tendency to buy clothes on the spur of the moment without planning beforehand. However, the male respondents were found to be more brand loyal ($M = 2.99$) in clothes shopping than were the females ($M = 2.57$).

As to fashion orientation, the female respondents preferred to be or regarded themselves to be fashion leaders more than did the males. Meanwhile, the male respondents in

Table 15
One-way ANOVA of Shopping Orientations
by Sex

Orientation	N	Mean	SD	F-stat.	p-value
<u>Economic Shopping</u>				0.09	0.77
Male	209	3.05	0.60		
Female	<u>198</u>	3.03	0.63		
Total	407	3.04	0.62		
<u>Personalizing Shopping</u>				0.74	0.39
Male	209	2.39	0.72		
Female	<u>198</u>	2.31	0.71		
Total	407	2.36	0.71		
<u>Recreational Shopping</u>				0.12	0.00
Male	208	3.12	0.96		
Female	<u>195</u>	3.86	0.86		
Total	403	3.48	0.98		
<u>Social Shopping</u>				37.92	0.00
Male	208	2.62	0.74		
Female	<u>195</u>	3.07	0.79		
Total	403	2.84	0.80		
<u>Friend Social</u>				31.50	0.00
Male	209	2.48	0.95		
Female	<u>198</u>	2.96	0.91		
Total	407	2.71	0.96		
<u>Family Social</u>				6.75	0.01
Male	209	1.12	0.43		
Female	<u>198</u>	1.24	0.49		
Total	407	1.18	0.46		
<u>Brand Loyal</u>				25.76	0.00
Male	209	2.99	0.75		
Female	<u>198</u>	2.57	0.78		
Total	407	2.78	0.79		
<u>Impulse Shopping</u>				55.23	0.00
Male	208	2.70	0.90		
Female	<u>195</u>	3.35	0.91		
Total	403	3.02	0.96		

Table 16
One-way ANOVA of Fashion Orientation
by Sex

Orientation	N	Mean	SD	F-stat.	p-value
<u>Fashion Leadership</u>				6.79	0.01
Male	208	2.52	0.79		
Female	<u>195</u>	2.70	0.79		
Total	403	2.61	0.78		
<u>Fashion Interest</u>				35.86	0.00
Male	209	2.56	0.84		
Female	<u>198</u>	3.07	0.93		
Total	407	2.81	0.92		
<u>Fashion Importance</u>				3.51	0.06
Male	209	3.53	0.67		
Female	<u>197</u>	3.65	0.66		
Total	406	3.59	0.66		
<u>Anti-fashion Attitude</u>				9.65	0.00
Male	209	3.85	0.76		
Female	<u>198</u>	3.64	0.66		
Total	407	3.75	0.72		

this study were more anti-fashion oriented than were the females.

In order to investigate if "sex" as a variable interacts with ethnicity, influencing respondents' apparel shopping orientations, two-way ANOVA was conducted to analyze shopping orientations by both sex and ethnicity. The results are presented in Table 17 and Table 18.

The results indicated that sex influences respondents' shopping orientations to a greater extent than does ethnicity (the p-values by sex were smaller or the sum of squares are bigger than those generated by ethnicity). However, there were no two-way interactions between sex and ethnicity on any of the seven shopping orientations.

These findings indicated that sex may be an important variable in distinguishing respondents on their apparel shopping orientations. Since there was no interaction between sex and ethnicity, the previous tests of hypotheses on respondents' shopping orientation by ethnicity were still valid although sex was not included as a source of variation when analyzing the data.

Summary

The statistical analysis revealed that null Hypothesis 1. was rejected. Also the null sub-hypotheses 1.4, 1.5 and 1.7 were rejected at the significance level of 0.05.

Table 17

Two-way ANOVA of Shopping Orientations
by Ethnicity & Sex
(N=401)

<u>Orientation</u>	Sum of			2-way
Source of Variation	Squares	F-stat.	p-value	interaction
<u>Economic Shopping</u>				
Ethnicity	0.17	0.46	0.50	0.063
Sex	0.03	0.09	0.77	
<u>Personalizing Shopping</u>				
Ethnicity	0.12	0.23	0.63	0.25
Sex	0.38	0.38	0.39	
<u>Recreational Shopping</u>				
Ethnicity	1.27	1.51	0.22	0.73
Sex	56.08	66.74	0.00	
<u>Social Shopping</u>				
Ethnicity	5.96	10.39	0.00	0.72
Sex	21.77	37.92	0.00	
<u>Friend Social Shopping</u>				
Ethnicity	6.58	7.70	0.01	0.60
Sex	26.59	31.50	0.00	
<u>Family Social Shopping</u>				
Ethnicity	1.23	5.88	0.02	0.28
Sex	1.41	6.75	0.01	
<u>Brand Loyal Shopping</u>				
Ethnicity	2.45	4.24	0.04	0.63
Sex	14.87	25.76	0.00	
<u>Impulse Shopping</u>				
Ethnicity	2.14	2.63	0.11	0.94
Sex	44.87	55.23	0.00	

Table 18
Two-way ANOVA of Fashion Orientation
by Ethnicity & Sex
(N=401)

<u>Orientations</u> Source of Variation	Sum of Squares	F-stat.	p-value	2-way interaction
<u>Fashion Leadership</u>				
Ethnicity	4.02	6.53	0.01	0.89
Sex	4.18	6.79	0.01	
<u>Fashion Interest</u>				
Ethnicity	1.33	1.70	0.19	0.32
Sex	28.00	35.86	0.00	
<u>Fashion Importance</u>				
Ethnicity	0.23	0.51	0.48	0.46
Sex	1.54	3.51	0.06	
<u>Anti-fashion Attitude</u>				
Ethnicity	0.10	0.20	0.65	0.76
Sex	4.91	9.65	0.00	

Significant differences were found between Asian and Caucasian Americans on social shopping, including both friend social and family social shopping, brand loyal shopping and fashion leadership orientations.

The Asian respondents were found to be significantly more brand loyal and liked to shop with friends or family members than were the Caucasian respondents. The Asian Americans students were also found to be more likely to regard themselves as fashion leaders than were the Caucasian students in this study.

The correlation test of Hypothesis 2. found a significant negative correlation between intensity of ethnic identification and fashion importance among Asian American respondents. This finding indicated that the more an Asian respondent identified with Asian ethnicity, the less (s)he considered being well-dressed as important.

CHAPTER V

SUMMARY AND RECOMMENDATIONS

The purpose of the present study was to compare differences in Asian American and Caucasian American apparel shopping orientations. Also this study examined the relationship between apparel shopping orientations and the intensity of ethnic identification among Asian Americans. Seven apparel shopping orientations were studied: economic shopping, personalizing shopping, recreational shopping, social shopping (including both shopping with friends and family), brand loyal shopping, impulse shopping, and fashion orientation (including fashion leadership, fashion interest, fashion importance and antifashion attitude factors).

Dillman's (1978) Total Design Method was used as a guideline in implementing the procedures of data collection. The data collection method involved a mailed questionnaire survey. A purposive sample of 300 Asian American and 300 Caucasian American students was drawn from the students enrolled at Oregon State University for the 1990 Fall Term. Survey response rates were 75.9% for the total sample, with 72.6% for the Asian group and 79.0% for the Caucasian group respectively. Hypotheses were tested by MANOVA, t-test and Pearson correlation analysis.

Findings and Marketing Implications

Results of multivariate analysis of variance (MANOVA) revealed that there were significant differences between Asian and Caucasian American students' apparel shopping orientations. Further t-test analyses indicated that they differed significantly on social shopping, both friend social and family social shopping, brand loyal shopping and fashion leadership orientations. However, they were not significantly different in terms of economic shopping, personalizing shopping, recreational shopping and impulse shopping.

The findings clearly indicated that Asian Americans tended to view apparel shopping as a social activity more than did the Caucasian Americans. This implied that Asian Americans liked to go shopping for clothes with either friends or family members more than the Caucasian American students. These findings were consistent with previous research results reported by Kotkin (1978) about Chinese shopping behavior. It was concluded by Kotkin that the Chinese liked shopping in large family groups. The findings generated from the present study suggested that this social shopping orientation could be generalized to Asian Americans at OSU (not only Chinese Americans).

However, it is noteworthy that group means for both Asians and Caucasians on the family social shopping

orientation were the lowest compared to all the other shopping orientations. These means were 1.23 for the Asian group and 1.13 for the Caucasian respectively. This implied that, as a whole, the student sample in this study, did not favor shopping for clothes with family members.

Therefore, when developing marketing strategies, marketers and retailers have to be very careful in applying this finding. In terms of apparel shopping, Asian Americans' social orientation in this study was not an absolute preference, but the Asians were more socially oriented in comparison to the Caucasians.

This finding agreed with part of the results found by Metropolitan Life Insurance, Inc. that the Asians Americans were more family oriented ("Asian-Americans...", 1986). Chowdhary and Dickey (1988) found cultural differences between Indian college women fashion leaders and those in Western society. The authors concluded that the role of parent and family members in legitimating the fashion choices of the respondents did reflect a cultural difference. However, the root cause of the significant difference found between the Asian and Caucasian Americans on family shopping orientation should be worthy of more research.

This finding could also be valuable for the apparel industry since it adds to our knowledge of how Asian Americans might shop for clothes differently from the

Caucasians. At least, this finding implied that the social aspect of apparel shopping might not be as important as other orientations when targeting the Asian and Caucasian college students.

The findings of this study also suggested that Asian American respondents tended to be more brand loyal than Caucasian Americans. Previous research on shopping orientations and ethnicity reached the same result. Westernman (1989) reported that minority consumers typically had strong brand loyalties and they were willing to pay extra for name brands. Valencia (1982) also found that Hispanics were more brand loyal than whites. Kim's (1987) study indicated that Korean immigrants had stronger national brand proneness than whites.

To many marketers, brand loyalty is a valuable characteristic of a target market and marketers could benefit from it. First, as suggested by Westerman (1989), brand loyal shoppers are willing to pay more for name brands. Second, usually it costs several times more to attract new customers than to maintain existing customers. Buyers who are loyal to a specific brand tend to be very difficult and very costly to convince to try another brand (Aaker & Myer, 1987). Therefore, apparel manufacturers and retailers could turn this finding into a key strategy when targeting the Asian American market segment.

For instance, investing in maintaining existing

customers (building brand loyalty among existing customers) might be a more cost/performance effective way of making profits than spending money on promotion to attract new customers from competitive brands. Moreover, having an Asian American customer might be a different thing than having a Caucasian customer, since the Asians tend to be more loyal to a brand than the Caucasians and might stay with the brand longer. On the other hand, losing an Asian customer would be different from losing an Caucasian customer. A lost Asian customer might be a permanent loss, because they might in turn become very loyal to a competitor's brand. But a lost Caucasian customer might come back in time, since compared to the Asians, the Caucasians are not as loyal to a specific brand.

Kim (1987) suggested that the reason why Korean immigrants were more brand loyal to certain brands was due to ego or self-enhancement. Korean immigrants might engage in conspicuous consumption or buying merely for the status-symbol a certain brand provides. Further study of the underlying causes(s) of brand loyal tendencies among minorities (or a specific ethnic group, such as Asian Americans) can provide marketers or retailers an important basis for attracting ethnic groups to a certain brand. Also it would be helpful for marketers or retailers to know what kind of brand image must be developed in order to maintain brand loyalty among the Asian customers.

Asian American respondents in this study were also found to possess more fashion leadership proneness than the Caucasians. They tended to regard themselves as fashion leaders more than the Caucasians. Chen's study in 1970 might explain some part of these findings. In her study Chinese were found to be more in favor of expressing status through clothing than the American group. However, to identify the underlying cause and motivation for this difference will require further study and exploration.

In their integrative analysis of fashion life-style, self-concept, shopping orientation and store patronage, Gutman and Mills (1982) profiled fashion leaders as those who scored higher on the fashion leadership factor, which set them apart from other segments. They found significant differences in self-concept between fashion leaders and non-leaders. Fashion leaders saw themselves as more sophisticated, modern, different, chance taking, confident, creative, sociable and having a more complicated life-style than non-leaders (such as followers, independents or laggards). Their study results also showed significant congruence existed between the attitudes expressed by fashion leaders and their shopping and store patronage behavior.

However, to determine how much of this portrait of fashion leaders developed by Gutman and Mills (1982) could be applied to Asian American students, requires further

research. Schrank, Sugawara & Kim (1982) found there were different attitudinal and social-economic characteristics between Korean and white fashion leader samples despite their similar fashion leadership characteristics.

The correlation analysis of shopping orientations and the intensity of ethnic identification found negative correlation between intensity of identification and fashion importance orientation among Asian American respondents. To be more specific, a negative relationship was found on the attitude towards the importance of being well-dressed among Asian Americans across the intensity of identification. The results suggested that the more an Asian American subject identified with Asian ethnicity, the less he (she) considered being well-dressed to be important. In other words, the more an Asian American respondent thought himself (herself) as an American (not Asian), the more he (she) considered being well-dressed to be important.

Although the underlying cause of why negative correlation existed between these two variables needs further study, this finding in itself should not be neglected. This finding suggested that how an Asian American perceived the importance of being well-dressed was significantly related to his(her) intensity of identification. In other words, by knowing the background of an Asian American, specifically which generation (s)he is in the U.S. might provide clues as to how he (she) perceives

the importance of being well-dressed.

From an academic point of view, more interestingly, why did this negative correlation not exist on other factors of fashion orientation? Why was it a negative correlation, not a positive one? All these questions could lead to more research on the acculturation/assimilation process and would add to our body of knowledge regarding Asian Americans.

Contrary to the previous findings, significant differences were not found on personalizing shopping and impulse shopping orientations. It was reported by Edmondson (1986) that Asian Americans tended to buy from people or companies that speak their language and understand their culture. Valencia (1982) found that Hispanics, as a minority group, were more likely to shop at smaller stores, and to dislike impersonal stores. However, in the present study, Asian American respondents did not show any significant difference from the Caucasians on personalizing orientation.

Gim (1988) suggested that Asian women were not impulsive buyers. Although the present study found that the female shoppers (of both ethnic groups) were significantly more impulse-oriented than were the males, the Asians did not differ from the Caucasians as a group on impulse shopping orientation.

These inconsistencies of findings may be owing to either the product type (apparel, specifically in this

study) or sample characteristics. Most of previous research on shopping orientation studied general shopping behavior, not apparel shopping specifically. Apparel shopping is often referred to as conspicuous consumption, that an individual's or family's wealth and status may be displayed through the consumption of apparel that is visibly expensive or fashionable (Kaiser, 1985). Apparel shopping has characteristics which make it different from other types of shopping, such as grocery shopping, and might not yield the same results as other studies. The purposive sample in this study was composed of college students on a West coast campus. They tended to be younger than the general population, more of them were single, many of them may not be totally economically independent of their families and they reside in a specific region. Due to these characteristics of the purposive sample, some differences might not be revealed in this study.

Conclusions

Two research questions were answered when the present study was completed: 1. What is the pattern of apparel shopping orientations of Asian American in comparison with Caucasian American students at OSU? 2. Is there any correlation between apparel shopping orientations and intensity of ethnic identification among OSU Asian American

students? Significant differences were found between the Asian American students and Caucasian American students on their brand loyal, friend social and family social as well as fashion leadership shopping orientations. The Asian American respondents were found to be more brand loyal, more liked to shop with friends and family members and more tended to view themselves as fashion leaders than did the Caucasian American respondents in this study. Also a significant negative correlation was found between the intensity of ethnic identification and fashion importance among Asian American respondents. It was found that the more an Asian respondent identified with Asian ethnicity, the less (s)he considered being well-dressed to be important.

The theoretical framework of this study was the consumer behavior model proposed by Engel, Kollat and Blackwell (1973). This model was partially supported by the finding of significant differences between Asian American and Caucasian American students' apparel shopping orientations. Results of the present study indicated that subjects of different ethnicities (Asian vs Caucasian) did demonstrate differences in their consumer behavior intentions. As one of the variables influencing decision process, culture and ethnicity play important roles in influencing consumer behavior. The significant differences between Asian and Caucasian students might influence

different stages of the decision process, from problem recognition, search, alternative evaluation to purchase.

Very little empirical research has been conducted on Asian Americans, as a whole, in relation to their consumer behavior, specifically their clothing behavior. The findings of present investigation provided insight as to how Asian American students at OSU differ from the majority Caucasian American students in apparel shopping behavior. The results of this study also provided one more justification to study Asian Americans as a market segment, besides their increasing numbers, changing social-economic levels and massive buying power as discussed in the introduction. The results are valuable to the apparel industry and will influence whether to consider Asian Americans as a distinct apparel market segment.

Also the results of this study provided support for the use of shopping orientations as a general but practical way of identifying a limited set of shopper types to which retail managers or apparel firms may direct differentiated marketing efforts. Academically, this study added to the body of literature on shopping orientations in relation to different ethnic groups, in addition to what has been investigated regarding Hispanics compared to whites (Valencia, 1982) or Korean immigrants compared to whites (Kim, 1987).

A new dimension of social shopping orientation was

identified and explored in this study: family social shopping--to shop with family members. In Valencia's study social shopping orientation was measured by shopping with friends only. The findings of present study suggested that the social shopping orientation may include two dimensions. The sub-scale developed by the researcher of this study (questions A.23 and A.27) proved to be successful in terms of reliability and validity. Moreover, it was found to be an orientation differentiating the Asians from the Caucasians with respect to apparel shopping.

This study also tested the reliability and validity of subjective, self-reported scales measuring intensity of ethnic identification. The intensity of identification has been measured multi-dimensionally by language, religion, generation or as part of an index of acculturation. In the present study, it was found that there was a significant difference in the intensity of identification by generation. The findings indicated that the older the generation of an Asian American student was in the U.S., the weaker (s)he identified with Asian ethnicity. This double check of the relationship between generation and intensity of identification provided one more reference for further study of how ethnicity may be measured.

Additional analysis indicated that, sex was an effective variable, besides ethnicity, in explaining differences in shopping orientations. This finding would be

valuable to fashion related research, since many studies have focused on female subjects only and their generalizability to the whole population is questionable.

Limitations

Before making recommendations, limitations of this study should be discussed. Owing to the time and financial constraint of the researcher, the sample used in this study was a purposive sample of Oregon State University students. The results cannot be generalized to the whole Asian American population.

The nature of this study was observational, no cause and effect relationship can be drawn from the findings. It cannot be concluded that ethnicity is the cause of the differences which were found in this study. Any difference found in this study should be interpreted as "group difference" which might be attributable to a number of factors other than ethnicity.

The self-reported apparel shopping orientations in the study indicated general shopper tendencies but may not be fully reflective of actual shopping behavior. Therefore, when applying the findings of this study, the results should be interpreted with caution.

The reliabilities and validity of some scales used in this study, such as reliability estimates on the economic

shopping orientation and the validity on friend social shopping orientation, need further testing and improvement. Therefore, the interpretation of findings on these orientations should be treated with caution, too.

The study focused on apparel shopping specifically. Therefore, the results might not be applicable to shopping behavior in regard to other product categories.

Recommendations for Future Research

Based on the results of the present study, the following recommendations for future research are proposed.

1. Replication of the present study,
 - a. with the revisions of some scales to improve the reliability and validity, such as reliability on economic shopping and validity on some items measuring friend social shopping orientation.
 - b. using a larger sample, a national probability sample, or a sample in another geographic area.
 - c. using shopping orientations which were not selected and tested in the present study.
2. Qualitative or experimental research is needed to identify the underlying causes or motivations for the significant differences found on brand loyal

shopping, friend and family social shopping and fashion leadership orientations in the present study.

3. More research is encouraged to examine the relationship between shopping orientations and other demographic factors (such as age, marital status and academic major) or the interaction between demographic factors and ethnicity.

REFERENCES

- Aaker, D. A. & Myers, J. G. (1987). Advertising Management (3rd). Englewood Cliffs, NJ: Prentice-Hall.
- Anderson, W. T., Jr. (1971). Identifying the convenience-oriented consumer. Journal of Marketing Research, 8(2), 179-183.
- Asian-Americans targeted by insurance firm. (1986, April). Marketing News, p. 34.
- Bahr, H. M., Chadwick, B. A., & Stauss, J. H. (1979). American ethnicity. Boston, MA: Health.
- Bannai, H., & Cohen, D. A. (1985). The passive - methodical image of Asian American students in the school system. Sociology and Social Research, 70(1), 79-81.
- Barker, H. R. & Barker, B. M. (1983). Multivariate Analysis of Variance (MANOVA): A practical guide to its use in scientific decision making. Alabama, The University of Alabama Press.
- Bellenger, D. N., & Korgaonkar, P. K. (1980). Profiling the recreational shopper. Journal of Retailing, 56(3), 77-92.
- Bellenger, D. N., & Valencia, H. (1982). Understanding the Hispanic market. Business Horizons, 12(3), 47-50.
- Blumer, H. (1969). Fashion: From class differentiation to collective selection. Sociological Quarterly, 10(2), 275-291.
- Boone, L. E., Kurtz, D. L. Johnson, J. C., & Bonno, J. A. (1974). "City shopper and urban identification" revised. Journal of Marketing, 38(3), 67-69.
- Bouvier, L. F. & Agresta, A. J. (1985, May). The fastest growing minority. American Demographics, pp. 30-33, 46.
- Chen, J. H. (1970). Clothing attitude of Chinese and American college women. Dissertation Abstracts International, 31, 5457B. (University Microfilms No. 71-6293)

- Choe, S. T. (1984). Acculturation and consumption patterns of ethnic consumers: The case of Korean immigrants in Dallas, Texas. Dissertation Abstracts International, 45, 2931A.
- Chowdhary, U., & Dickey, L. (1988). Fashion opinion leadership and media exposure among college women in India. Home Economics Research Journal, 16(3), 183-194.
- Creekmore, A. M. (1963). Clothing behavior and their relation to general values and to the striving for basic needs. Dissertation Abstracts International, 24, 1599. (University Microfilms No. 63-6292)
- Darden, W. R., & Ashton, D. (1974-1975). Psychographic profiles of patronage preference groups. Journal of Retailing, 50(4), 99-112.
- Darden, W. R., & Perreault, Jr., W. D. (1976). Identifying interurban shoppers: Multiproduct purchase patterns and segmentation profiles. Journal of Marketing Research, 13(1), 51-60.
- Darden, W. R., & Reynolds, F. D. (1971). Shopping orientations and product usage rates. Journal of Marketing Research, 8(4), 505-508.
- Dardis, R., Derrick, F., & Lehfeld, A. (1981). Clothing demand in the United States: A cross-sectional analysis. Home Economics Research Journal, 10(2), 212-222.
- Deshpande, R. Hoyer, W. D., & Donthu, N. (1986). The intensity of ethnic affiliation: A study of the sociology of Hispanic consumption. Journal of Consumer Research, 13(2), 214-220.
- Dillman, D. A. (1978). Mail and telephone surveys: The total design method. New York: John Wiley.
- Edmondson, B. (1986, July). Met Life mines minority market. American Demographics, p. 19.
- Engel, J. F., Blackwell, R. D., & Miniard, P. W. (1986). Consumer Behavior (5th Ed.). New York: CBS College Publishing.
- Engel, J. F., Kollat, D. T., & Blackwell, R. D. (1973). Consumer Behavior (2nd Ed.). New York: Holt, Rinehart and Winston.

- Feldman, L. P., & Star, A. D. (1968). Racial factors in shopping behavior. In K. Cox & B. M. Enis (Eds.). A new measure of responsibility for marketing, 1968 June Conference Proceedings, Series No. 27. (pp.216-226). Philadelphia, American Marketing Association.
- Foote, J. (1987, September, 7). Tapping into a blossoming Asian market. Newsweek, pp. 47-48.
- Forney, J. C. & Rabolt, N. J. (1986). Ethnic identity: Its relationship to ethnic and contemporary dress. Clothing and Textiles Research Journal, 4(2), 1-8.
- Gergen, D. R. (1988, March 14). America's new talent bank. U.S. News & World Report, p.80.
- Gillett, P. L., & Scott, R. A. (1974). Shopping opinions of Mexican-American consumers: A comparative analysis. In R. C. Curhan (Ed.), New marketing for social and economic progress and marketing's contribution to the firm and to the society, 1974 Combined Proceedings, Series No 36. (pp. 135-141). American Marketing Association.
- Gim, G. J. (1988). Clothing acquisition patterns and size information of Oriental female immigrants. (Master thesis, the University of Arizona). Masters Thesis Abstracts International, 27, 386.
- Goldsmith, R. E., Stith, M. T., & White, J. D. (1987). Race and sex differences in self-identified innovativeness and opinion leadership. Journal of Retailing, 63(4), 411-424.
- Gould, K. H. (1988). Asian and pacific islanders: Myth and reality. Social Work, 33, 142-147.
- Gutman, J., & Mills, M. K. (1982). Fashion life style, self-concept, shopping orientation, and store patronage: An integrative analysis. Journal of Retailing, 58(2), 64-86.
- Hamilton, J. A., & Hamilton, J. W. (1989). Dress as a reflection and sustainer of social reality: A cross-cultural perspective. Clothing and Textiles Research Journal, 7(2), 16-22.
- Henry, W. A. (1976). Cultural values do correlate with consumer behavior. Journal of Marketing Research, 13, 121-127

- Hirschman, C. & Wong, M. G. (1984). Socioeconomic gains of Asian Americans, blacks, and Hispanics: 1960-1976. American Journal of Sociology, 90, 584-609.
- Hirschman, E. C. (1981). American Jewish ethnicity: Its relationship to some selected aspects of consumer behavior. Journal of Marketing, 45(3), 102-110.
- Hoffman, E. L. (1982). Dress and acculturation: Clothing transitions of the Mien. Unpublished master's thesis, Oregon State University, Corvallis, Oregon.
- Holbrook, M. B., & Hirschman, E. C. (1982). The experiential aspects of consumption: Consumer fantasies, feelings, and fun. Journal of Consumer Research, 9(2), 132-140.
- Howell, R. D. (1979). A multivariate examination of a patronage model: The impact of values and life style on shopping orientations (Doctoral dissertation, University of Chicago). Dissertation Abstracts International, 40, 1660A.
- Hutnik, N. (1986). Patterns of ethnic minority identification and modes of social adaptation. Ethnic and Racial Studies, 9(2), 151-166.
- Kaiser, S. B. (1985). The social psychology of clothing. New York: Macmillan.
- Kern, R. (1988, May). The Asian market: Too good to be true? Sales & Marketing Management, 140, pp. 38-42.
- Kim, S. H. (1987). A comparative study of shopping orientations between Korean immigrants and whites in Allegheny County. (Doctoral dissertation, University of Pittsburgh). Dissertation Abstracts International, 49, 884A.
- Korgaonkar, P. K. (1981). Shopping orientations of catalog showroom patrons. Journal of Retailing, 57(1), 79-91.
- Kotkin, J. (1987, July). Selling to the new America. Inc. pp. 45-51.
- Kwon, Y. H. (1982). Clothing practices of Korean female immigrants in Chicago. Journal of Consumer Studies and Home Economics, 6(4), 337-349.

- Lapitsky, M. (1961). Clothing values and their relation to general values and to social security and insecurity. Dissertation Abstracts, 22, 244. (University Microfilms No. 61-2382)
- Less, J. (1987, August). Throw out the cookie cutter. Apparel Industries, pp. 108-109.
- Linton, R. (1945). The cultural background of personality. New York: Appleton-Century-Crofts.
- Lumpkin, J. R. (1980). Relating television preference viewing to shopping orientations and life styles: The examination of perceptual and preference dimensions of television programming. Dissertation Abstracts International, 41, 2207A. (University Microfilms No. 80-26, 095)
- Lumpkin, J. R., & Greenberg, B. A. (1982). Apparel-shopping patterns of the elderly consumer. Journal of Retailing, 58(4), 68-89.
- Manning, W. & O'Hare, W. (1988, August). Asian American business. American Demographics, pp. 34-37.
- Mcdonagh, E. C., & Richards, E. S. (1972). Ethnic relations in the United States. Connecticut: Negro Universities Press., p.4.
- McLeod, B. (1986, July). The oriental express. Psychology Today, pp. 48-52.
- Mendoza, A. R. (1965). Clothing values and their relation to general values: A cross-cultural study. Dissertation Abstracts International, 26, 6688. (University Microfilms No. 66-4831)
- Miller, S. J. (1982). An examination of sex-role orientations and their relationships with shopping and lifestyles. Dissertation Abstracts International, 43, 3404A. (University Microfilms No.83-05, 160)
- Moschis, G. P. (1976). Shopping orientations and consumer uses of information. Journal of Retailing, 52(2), 61-93.
- Nee, V. & Sanders, J. (1985). The road to parity: Determinants of the socioeconomic achievement of Asian Americans. Ethnic and Racial Studies, 8(1), 76-93.
- Nivison, D. C., & Wright, A. F. (1959). Confucianism in action. Palo Alto, CA: Stanford University Press.

Oregon State University, (1990, Fall). Asian American versus White American student population. Institutional Research and Planning. Corvallis, OR: Oregon State University.

Passante, D. L. (1976, October 25). The Hispanic market: A whole other world for the advertiser. Broadcasting, 9(2), P. 12.

Patel, D. I. (1988). Asian Americans: A growing force. The Journal of State Government, 61, 71-76.

Peter, J. P. (1979). Reliability: A review of psychometric basics and recent marketing practices. Journal of Marketing Research, 16 (1), 6-17.

Powell, T. E. (1980). An estimation of the structural parameters of the shopping orientations portion of the Darden model of patronage behavior. (Doctoral dissertation, University of Arkansas, 1980). Dissertation Abstracts International, 41, 2268-A.

Quotas on Campus: The new phase. (1989, January 30). Fortune, 119, pp.205-208.

Roach, M. E., & Eicher, J. B. (1965). Dress, adornment and the social order. New York: Wiley.

Robertson, T. S., Dalrymple, D. J., & Yoshino, M. Y. (1969). Cultural compatibility in new product adoption. Proceedings of the 1969 Fall Conference of American Marketing Association, 30, 70-75.

Robery, B. (1985, May). America's Asians. American Demographics, 7, pp.22-29.

Ryan, M. S. (1966). Clothing, a study in human behavior. New York: Holt, Rinehart and Winston.

Schrank, H. L. (1973). Correlates of fashion leadership: Implication for fashion process theory. The Sociological Quarterly, 14, 534-543.

Schrank, H. L., Sugawara, A. I., & Kim, M. (1982). Fashion leadership: A two-cultural study. Part 2: Comparison of Korean and American fashion leaders. Home Economics Research Journal, 10(3), 253-240.

Senga, S. S., Brown, S. A., & Gonzales, C. A. (1987). Clothing values of Filipino women residing in Canada. Canadian Home Economics Journal, 37(1), 33-38.

- Sletten, R. C. G., & Petrich, B. A. (1983). Clothing problems as perceived by Mexican American migrant women. Home Economics Research Journal, 11(3), 289-294.
- Starr, F. (1930). Confucianism: Ethics, philosophy and religion. New York: Covici-Friede.
- Stephenson, P. R., & Willett, R. P. (1969). Analysis of consumers' retail patronage strategies. Proceedings of the 1969 Fall Conference of the American Marketing Association, 30, 316-322.
- Stone, G. P. (1954). City shoppers and urban identification: Observations on the social psychology of city life. The American Journal of Sociology, 60(1), 36-45.
- Tan, C. T., & McCullough, J. (1984). Relating ethnic attitudes and consumption values in an Asian context. In E. C. Hirschman & M. B. Holbrook (Eds.). Advances in Consumer Research, 12, 122-125.
- Tatzel, M. (1982). Skill and motivation in clothes shopping: Fashion conscious, independent, anxious and apathetic consumers. Journal of Retailing, 58(4), 90-96.
- Thornton, M. C., & Taylor, R. J. (1988). Intergroup attitudes: Black American perceptions of Asian Americans. Ethnic Racial Studies, 11(4), 474-488.
- U. S. Department of Commerce, Bureau of the Census (1984). 1980 Census of population, Vol. 1, characteristics of the population, chapter D, detailed population characteristics, part I, United States summary, Appendix B Washington D. C.: U. S. Government Printing Office, p.B-3.
- U. S. Department of Commerce, Bureau of the Census (1987). Current population reports: Population profile of the United States, 1984/1985, Special Studies, Series p-23, no. 150, National population trends. Washington D. C. : U. S. Government Printing Office, pp. 5-7.
- Valencia, H. (1982). Shopping orientations among Hispanics and Caucasians in the United States. (Doctoral dissertation, Georgia State University). Dissertation Abstracts International, 43, 3405A.
- Webster, F. E. Jr. (1965, May). The "deal-prone" consumer. Journal of Marketing Research, 2, 186-189.

- Westbrook, R. A., & Black, W. C. (1985). A motivation-based shopper typology. Journal of Retailing, 61(1), 78-103.
- Westernman, M. (1989, March). Death of the Frito Bandito. American Demographics, pp. 28-32.
- Williams, R. H., Painter, J. J., & Nicholas, H. R. (1978). A policy-oriented typology of grocery shoppers. Journal of Retailing, 54(1), 27-42.
- Wilson, C. L. (1966). Homemaker living patterns and marketplace behavior - A psychometric approach. In J. S. Wright & J. L. Goldstucker (Ed.), Proceedings of the 1966 World Congress of the American Marketing Association (pp. 305-331). Chicago: The Palmer House.
- Wong, M. G. (1986, September). Post-1965 Asian immigrants: Where do they come from, where are they now, and where are they going. The Annals of the American Academy of Political and Social Science, 487, 150-168.
- Yao, E. L. (1985). A comparison of family characteristics of Asian-American and Caucasian-American high achievers. International Journal of Comparative Sociology, 26(3-4), 199-207.
- Zinsmeister, K. (1988, February). Asians and blacks-bittersweet success. Current (Washington D. C.), 300, 9-16.

APPENDICES

Appendix A
Correspondence for the Survey

(Cover Letter -- First Mailing)

October 30, 1990

Name

Address

Do you like to shop? We are interested in finding out what you like and dislike about shopping for clothes. Your opinions regarding clothing shopping are also important to apparel manufacturers and retailers in their efforts to address consumer needs and concerns.

You have been selected as one of a small number of OSU students to give your opinions on shopping. A random sample was drawn from the students enrolled at Oregon State University (OSU) Fall Term, 1990. In order that the results truly represent the attitudes of students at OSU, it is important that each questionnaire be completed and returned.

You may be assured of complete confidentiality. The questionnaire has an identification number for mailing purposes only. Your name will never be placed on the questionnaire. You may receive a summary of the results by writing your name and address on the back of the return envelope (not on the questionnaire). We would be pleased to answer any questions you might have. Please write or call. The telephone numbers are (W) 737-0986, or (H) 758-7568.

Thank you for your cooperation.

Sincerely,

Angie Ho
Graduate Student

Dr. Cheryl Jordan
Assistant Professor

(Postcard Reminder)

November, 1990

Last week a questionnaire seeking your opinions about shopping for clothes was mailed to you. Your name was drawn in a random sample of students enrolled at OSU Fall Term, 1990.

If you have already completed and returned it to me please accept my sincere appreciation. If not, please do so today. It is so important because it has been sent to only a small, but representative, sample of OSU students. Your assistance will contribute a lot to the representativeness of the results of the study.

If you did not receive the questionnaire, or it got misplaced, please call me and I will mail another one for you immediately. My telephone numbers are (W) 737-0986, or (H) 758-7568.

Sincerely,

Angie Ho
Project Director

November 13, 1990

Name
Address

About two weeks ago a letter and questionnaire were mailed to you seeking your opinions about clothing shopping. As of today I have not received your completed questionnaire.

The purpose of this study is to find out how college students shop for clothes. Apparel manufacturers and retailers who are interested in producing products and services for young adults will benefit from the results of this study. Moreover, as a consumer like you will also benefit from the study because your concern and need can be addressed more precisely.

I am writing to you again because of your significance to the study. Your name was drawn from a random sample in which every student enrolled at OSU Fall Term, 1990 has an equal opportunity to be selected. In order for the results of the study to be truly representative of the attitudes of students at OSU, it is essential that each person in the sample return their questionnaire.

In case your questionnaire has been misplaced, a replacement is enclosed. Please fill it out and mail it back today.

Your cooperation is highly appreciated.

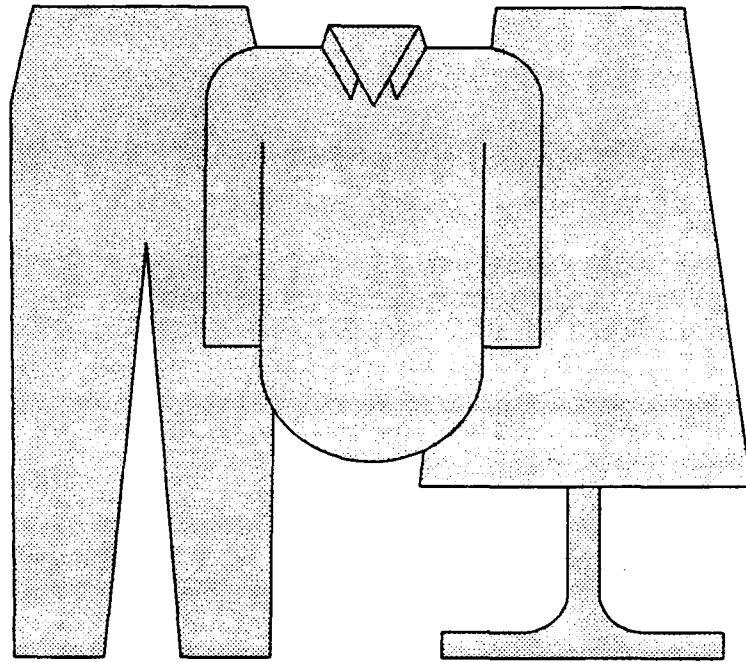
Sincerely,

Angie Ho
Graduate student

Dr. Cheryl Jordan
Assistant Professor

Appendix B
Questionnaire

HOW DO YOU SHOP FOR CLOTHES ?



ANGIE HO
DEPARTMENT OF APPAREL, INTERIORS,
HOUSING AND MERCHANDISING
OREGON STATE UNIVERSITY
MILAM HALL #224
CORVALLIS, OR 97331



- A. The following is a set of statements describing the way people shop for apparel. For each of the statements below, please circle the answer that best describes how much you **DISAGREE** or **AGREE** with that statement. Your answer may range from **STRONGLY DISAGREE** (1) to **STRONGLY AGREE** (5) or anywhere in between.

	STRONGLY DISAGREE				STRONGLY AGREE
1. In general, I enjoy shopping for clothes	1	2	3	4	5
2. I like to go shopping for clothes with my friends.....	1	2	3	4	5
3. I like to shop for clothes where the sales people know me by name	1	2	3	4	5
4. I prefer buying only specific brands of clothing.....	1	2	3	4	5
5. I only buy clothing I had in mind before entering the store.....	1	2	3	4	5
6. Clothes are too expensive in small stores.....	1	2	3	4	5
7. I normally do not buy unknown brands of clothes.....	1	2	3	4	5
8. I am not interested in shopping for clothes.....	1	2	3	4	5
9. I try to get to know the sales people in the stores where I shop for clothes.....	1	2	3	4	5
10. Big chain stores, such as Target or Kmart, offer better bargains on clothing items....	1	2	3	4	5

Please go to the next page

	STRONGLY DISAGREE			STRONGLY AGREE		
11. When in the store, I often buy clothing on the spur of the moment.....	1	2	3	4	5	
12. Department stores, such as Meier & Frank or The Bon, have reasonable prices on clothing..	1	2	3	4	5	
13. Shopping for clothes gives me a chance to talk to people with similar interests.....	1	2	3	4	5	
14. Shopping for clothes is a terrible waste of time.....	1	2	3	4	5	
15. I often end up buying clothes I had not intended to buy.....	1	2	3	4	5	
16. Once I find a brand of apparel I like, I stick with it.....	1	2	3	4	5	
17. I like it when my friends ask me to go shopping for clothes with them.....	1	2	3	4	5	
18. Prices for clothing are higher at smaller stores.....	1	2	3	4	5	
19. I do not like to talk to sales people in the stores where I shop for clothes.....	1	2	3	4	5	
20. For me, shopping for clothes is fun anywhere.....	1	2	3	4	5	
21. I get a psychological lift from shopping for clothes.....	1	2	3	4	5	
22. If I do not find my brand of clothes in the store, I will try some other brands.....	1	2	3	4	5	

Please turn the page

	STRONGLY DISAGREE			STRONGLY AGREE		
23. I seldom go shopping for clothes with my family.....	1	2	3	4	5	
24. I do not care whether people in the store know me or not when I shop for clothes.....	1	2	3	4	5	
25. Shopping for clothes is a real bother in any store.....	1	2	3	4	5	
26. I normally stick to my written or mental clothing shopping list.....	1	2	3	4	5	
27. I enjoy shopping for clothes with my family.....	1	2	3	4	5	

B. The following questions are about fashion trends and the relationship between fashion and clothes. Please circle the number that best describes how much you DISAGREE or AGREE with that statement.

	STRONGLY DISAGREE			STRONGLY AGREE		
1. It is important for me to be a fashion leader.....	1	2	3	4	5	
2. I am not the first one to try new fashion trends	1	2	3	4	5	
3. I am confident in my ability to recognize fashion trends...	1	2	3	4	5	
4. Dressing is one of the most important ways I have of expressing my individuality...	1	2	3	4	5	
5. Many people regard me as being a fashion leader.....	1	2	3	4	5	

Please go to the next page

	STRONGLY DISAGREE				STRONGLY AGREE	
6. Because of my active life style, I need a wide variety of clothes.....	1	2	3	4	5	
7. I always buy at least one outfit of the latest fashion.....	1	2	3	4	5	
8. I seldom read fashion magazines or pay attention to fashion trends.....	1	2	3	4	5	
9. I spend a lot of money on clothes and accessories.....	1	2	3	4	5	
10. I do not spend time on fashion-related activities....	1	2	3	4	5	
11. It's important to be well-dressed.....	1	2	3	4	5	
12. If you want to get ahead, you have to dress the part.....	1	2	3	4	5	
13. What you think of yourself can be reflected by what you wear.....	1	2	3	4	5	
14. Wearing good clothes is part of leading the good life.....	1	2	3	4	5	
15. I resent being told what to wear by so-called fashion experts.....	1	2	3	4	5	
16. Fashion in clothes is just a way to get more money from the consumer.....	1	2	3	4	5	
17. I buy clothes I like, regardless of current fashion.....	1	2	3	4	5	

Please turn the page

C. The following three questions will help us understand how you identify with your ethnic heritage. All answers will be kept confidential.

1. With which ethnic or racial group do you identify yourself (Circle only one):

<p>1 ASIAN AMERICAN →</p> <p>2 CAUCASIAN →</p> <p>3 OTHER (Please specify _____)</p>	<p>if you choose 2, please skip 1a and 1b</p>
--	---

<p>→ 1a At a fundamental level, I really think of myself as Asian.....</p> <p>→ 1b I think of myself as American.....</p>	<table border="1" style="border-collapse: collapse; width: 100%;"> <tr> <td style="width: 20%; text-align: center;">STRONGLY DISAGREE</td> <td style="width: 20%;"></td> <td style="width: 20%;"></td> <td style="width: 20%;"></td> <td style="width: 20%;"></td> <td style="width: 20%; text-align: center;">STRONGLY AGREE</td> </tr> <tr> <td style="text-align: center;">1</td> <td style="text-align: center;">2</td> <td style="text-align: center;">3</td> <td style="text-align: center;">4</td> <td style="text-align: center;">5</td> <td></td> </tr> </table>	STRONGLY DISAGREE					STRONGLY AGREE	1	2	3	4	5	
STRONGLY DISAGREE					STRONGLY AGREE								
1	2	3	4	5									

D. A few more questions about yourself so that we can accurately describe our sample. All answers will remain confidential. Please circle or fill in the best answer to each question.

1. How old were you on your last birthday?

_____ YEARS

2. Are you male or female? (Circle one number)

- 1 MALE
2 FEMALE

3. What was your class standing at the beginning of Fall Term, 1990? (Circle one number)

- 1 FRESHMAN
2 SOPHOMORE
3 SENIOR
4 GRADUATE STUDENT
5 OTHER (Please specify _____)

Please go to next page

4. What college are you in currently? (Circle one number)

- 1 COLLEGE OF AGRICULTURAL SCIENCE
- 2 COLLEGE OF BUSINESS
- 3 COLLEGE OF EDUCATION
- 4 COLLEGE OF ENGINEERING
- 5 COLLEGE OF FORESTRY
- 6 COLLEGE OF HEALTH AND HUMAN PERFORMANCE
- 7 COLLEGE OF HOME ECONOMICS
- 8 COLLEGE OF LIBERAL ARTS
- 9 COLLEGE OF OCEANOGRAPHY
- 10 COLLEGE OF PHARMACY
- 11 COLLEGE OF SCIENCE
- 12 COLLEGE OF VETERINARY MEDICINE
- 13 INTERDISCIPLINARY PROGRAMS

5. Where were you born ? (Circle one number)

- 1 BORN IN THE UNITED STATES
- 2 BORN IN ANOTHER COUNTRY

→ 5a. In what country were you born?

_____ COUNTRY

6. How many years, altogether, have you lived in the United States?

_____ YEARS

7. Which generation of your family first came to the United States? (Circle one number)

- 1 YOUR GREAT GRAND PARENTS
- 2 YOUR GRAND PARENTS
- 3 YOUR PARENTS
- 4 YOU ARE THE FIRST
- 5 I DO NOT KNOW
- 6 OTHER (Please specify _____)

Please turn the page

8. What is your citizenship?

- 1 UNITED STATES
- 2 OTHER (Please specify _____)

9. Are you? (Circle one number)

- 1 SINGLE, NEVER MARRIED
- 2 MARRIED
- 3 SEPARATED
- 4 DIVORCED
- 5 WIDOWED

10. How many persons, including yourself, were living in the household you grew up in?

_____ PERSONS

11. And what was (is) the occupation of the head of the household you grew up in?

_____ OCCUPATION

12. When you were growing up how many wage earners were there in your household?

_____ NUMBER OF WAGE EARNERS

13. Is there anything else you would like to say about shopping for clothes? Please use the space below to tell us.

YOUR COOPERATION IS TRULY APPRECIATED.

If you would like a summary of the results of this study. Please write your name and address on the back of the return envelope (not on the questionnaire).

Please return this in the enclosed reply envelope (no postage necessary) or return to:

Angie Ho
Department of Apparel, Interiors
Housing and Merchandising
Oregon State University
Milam Hall #224
Corvallis, OR 97331



Appendix C
Application for Exemption Review
Protection of Human Subjects



OREGON STATE UNIVERSITY

Administrative Services A312 Corvallis, Oregon · 97331-2140
503-737-3437 · FAX 503-737-3093 · Telex 5105960682 OSU-COV5

October 25, 1990

Principal Investigator:

It has been determined that the following project is exempt from review by Oregon State University's Committee for the Protection of Human Subjects under guidelines from the U.S. Department of Health and Human Services:

Principal Investigator: Cheryl Jordan

Student's Name (if any): Angie Ho

Department: AIHM

Source of Funding: _____

Project Title: A Comparative Study of Shopping Orientations
between Asian Americans and Anglo Americans

Comments: _____

A copy of this information will be provided to the Chair of the Committee for the Protection of Human Subjects. If questions arise, you may be contacted further.

Redacted for Privacy _____

Mary Lou Perkins
Research Development Officer

cc: CPHS Chair